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**REMEDIAL ASSESSMENT AND SOIL EXCAVATION REPORT
FORMER GENERAL MOTORS CORPORATION
ALLISON GAS TURBINE DIVISION, PLANT 10
700 NORTH OLIN AVENUE
INDIANAPOLIS, INDIANA
IDEM VRP #6991004
KERAMIDA PROJECT NO. 2829E**

Submitted to:

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
Erin Brittain, Project Manager
Voluntary Remediation Program
Office of Land Quality
100 North Senate Avenue
Indianapolis, Indiana 46204

Submitted for:

GENUINE PARTS COMPANY
Mr. Bob Lewis
Environmental, Safety and DOT Compliance Manager
2999 Circle 75 Parkway
Atlanta, Georgia 30339

Submitted by:

KERAMIDA ENVIRONMENTAL, INC.
401 North College Avenue
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July 23, 2007

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EXECUTIVE SUMMARY

KERAMIDA Environmental, Inc. (KERAMIDA) was contracted by the Genuine Parts Company (Genuine Parts) to perform a Remedial Assessment (RA) and to implement a remedial action based on the conclusions identified during this RA at the former General Motors Corporation, Allison Gas Turbine Division (AGT) Plant 10 in Indianapolis, Indiana (Site). The RA was conducted during the period of July 22, 2004 through June 28, 2006. The purpose of the RA was to determine if residual source materials were affecting volatile organic compound (VOC) contamination reduction in the area of monitoring well MW-153 (western source area) and MW-10-1R (eastern source area). Based on RA activities, soil excavation in the western source area was conducted during the period of August 21 through October 16, 2006 to remove residual trichloroethylene (TCE)-impacted soils.

A combined air sparging / soil vapor extraction Remediation System is used at the Site to facilitate remediation as documented in the Remediation Work Plan (RWP). However, dissolved TCE concentrations in groundwater at MW-153 and MW-10-1R and dissolved cis-1,2-dichloroethylene (cis-1,2-DCE) concentrations in groundwater at MW-153 were observed to fluctuate above and below their respective Indiana Department of Environmental Management (IDEM) Voluntary Remediation Program (VRP) Tier II Non-Residential Cleanup Goals (remedial objectives).

REMEDIAL ASSESSMENT

KERAMIDA completed exploratory trenching and advanced soil borings in the western source area in areas not previously excavated and around the VOC and Lead soil "hot spot." KERAMIDA also advanced soil borings in the eastern source area in up-gradient locations proximal to MW-10-1R. In addition, KERAMIDA conducted quarterly sampling events of the monitoring well network during and after RA activities to monitor the western and eastern source areas.

Western Source Area

No new areas of residual source materials were found, yet VOC impacts above remedial objectives were found in soils and groundwater. Impacts were divided into three general areas located between the Northwestern and Southwestern Remediation Systems and within the Northwestern Remediation System. Based on RA and quarterly groundwater sampling results

including lithology, options to attain remedial objectives were evaluated and the excavation of impacted soils with off-Site disposal was selected along with the continued operation of the Southwestern Remediation System.

Eastern Source Area

No new areas of residual source materials were found. TCE was detected in soil in one push probe location at a concentration well below its remedial objective. All but one of the groundwater samples collected from the push probe borings contained contaminant concentrations below their respective remedial objective. One sample, near MW-10-1R, contained a TCE concentration above its remedial objective, however, a sample collected from MW-10-1R had a TCE concentration well below its remedial objective.

Based on the results from quarterly groundwater monitoring conducted following RA activities, the Eastern Remediation System was shut down on January 30, 2006, based on four consecutive quarters of groundwater VOC concentrations below remedial objectives. Groundwater VOC concentrations, for the fifth quarter since the system was shut down, have remained below their remedial objectives.

SOIL EXCAVATION ACTIVITIES

A total of 3,670 tons of TCE-impacted hazardous soil and 4,814 tons of TCE-impacted non-hazardous soil were removed and disposed of off-Site at a Subtitle "C" Landfill. The TCE-impacted soil occurrence identified in the western source area has been remediated to concentrations below remedial objectives. However, one VOC constituent, vinyl chloride, was detected at a concentration above its remedial objective in one small area. Vinyl chloride was detected from soil collected from the sidewall of the excavation at the Holt Road entrance. Due to the close proximity of the right-of-way for Holt Road further excavation was not feasible. No further remediation of soil associated with the western source area appears warranted.

Quarterly groundwater sampling events conducted in the western source area following the removal and off-Site disposal of TCE-impacted soils have indicated that groundwater VOC concentrations are below remedial objectives.

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- 1 Soil Boring Logs and Well Construction Diagrams
- 2 Investigative Soil and Groundwater Analytical Reports
- 3 Waste Characterization Soil Analytical Reports
- 4 Photographic Log
- 5 Well Abandonment Records
- 6 Soil Disposal Documentation
- 7 Confirmatory Soil Analytical Report

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1.0 INTRODUCTION

KERAMIDA Environmental, Inc. (KERAMIDA) was contracted by the Genuine Parts Company (Genuine Parts) to perform a Remedial Assessment (RA) and to implement a remedial action based on the conclusions identified during this RA at the former General Motors Corporation, Allison Gas Turbine Division (AGT) Plant 10 in Indianapolis, Indiana (Site). The RA was conducted during the period of July 22, 2004 through June 28, 2006. The purpose of the RA was to determine if residual source materials are affecting volatile organic compound (VOC) contamination reduction in the area of monitoring well MW-153 (western source area) and MW-10-1R (eastern source area). Based on RA activities, soil excavation in the western source area was conducted during the period of August 21 through October 16, 2006 to remove residual trichloroethylene (TCE)-impacted soils in the western source area. Regulatory closure of the Site is being administered through the Indiana Department of Environmental Management (IDEM) Voluntary Remediation Program (VRP). The following report documents field activities and provides conclusions based on RA and soil remedial activities results.

2.0 SITE BACKGROUND

The subject property is located at 700 North Olin Avenue in Marion County, Indianapolis, Indiana (see Figure 1). The property is the former Site of the General Motors Corporation, AGT Plant 10. Between 1956 and 1973, BHT Corporation (BHT) operated the facility for carburetor and brake re-manufacturing. General Motors Corporation purchased the property from BHT in 1973 and used the facility for warehousing obsolete machines, tooling, and fixtures until the mid-1980s, at which time the property became part of the AGT Division. BHT became a part of Genuine Parts, through acquisition and merger, subsequent to the sale of the property to General Motors Corporation. AGT continued to use the facility for warehousing until December 1993 when the property was sold to the Allison Engine Company (AEC). AEC sold the facility to

Associated Properties, Inc. in 1998. Associated Properties, Inc. sold the facility to American Art Clay Company, Inc. in 2002 (current property owner).

A combined air sparging / soil vapor extraction Remediation System is utilized at the Site to facilitate remediation as documented in Section 8.2 of the Remediation Work Plan (RWP) dated August 16, 2004. However, dissolved TCE concentrations in groundwater at MW-153 and MW-10-1R and dissolved cis-1,2-dichloroethylene (cis-1,2-DCE) concentrations in groundwater at MW-153 were observed to fluctuate above and below their respective IDEM VRP Tier II Non-Residential Cleanup Goals (remedial objectives). A Site map showing Site features near the RA areas is presented as Figure 2.

3.0 REMEDIAL ASSESSMENT

The purpose of the RA is to determine if residual source materials are affecting contamination reduction in the area of MW-153 (western source area) and MW-10-1R (eastern source area). KERAMIDA completed exploratory trenching and advanced soil borings using a Bobcat® mounted Geoprobe® percussive rig in the western source area in areas not previously excavated and around the VOC and Lead soil "hot spot" (See section 8.3 of the RWP). KERAMIDA also advanced soil borings in the eastern source area in up-gradient locations proximal to MW-10-1R. In addition, KERAMIDA has conducted quarterly sampling events of the monitoring well network during and after RA activities to monitor the western and eastern source areas.

3.1 FIELD METHODS

Field methods used during the quarterly groundwater sampling of the monitoring well network are documented quarterly to the IDEM in Remediation System Evaluation Reports.

3.1.1 Exploratory Trenching - Western source Area

Prior to the commencement of field activities, KERAMIDA contacted Indiana Underground Plant Protection Service (IUPPS) to mark all underground public utilities at the Site. KERAMIDA performed test-trenching activities at the Site on July 22 and 23, 2004. The test trenches were excavated using a track-mounted mini-excavator. All work was supervised and completed by KERAMIDA personnel. Mr. William Wieringa, the IDEM VRP Project Manager for this facility, during this timeframe, and Mr. Bob Lewis with Genuine Parts were also present for part of the day on July 22, 2004. Exploratory trenching locations are depicted on Figure 3.

The exploratory trenches were excavated to a maximum depth of six feet with an average depth of 3.5 to 4.5 feet, which was approximately 2 to 3 feet into native material. Excavated soils were placed adjacent to their respective trenches. These soils along with trench walls and bottoms were inspected for residual source materials and were field screened using a photoionization detector (PID). At the end of each day, following inspections and soil screening, trenches were backfilled and compacted using the mini-excavator.

3.1.2 Geoprobeing - Western source Area

Prior to the commencement of field activities, KERAMIDA contacted Indiana Underground Plant Protection Service (IUPPS) to mark all underground public utilities at the Site. KERAMIDA performed probing activities at the Site on August 10 and 11, 2004 (borings KB-52 through KB-59), September 14, 2004 (KB-60 through KB-65), October 3, 2005 (borings KB-71 and KB-72), and June 28, 2006 (borings KB-73 through KB-78).

Probing activities at borings KB-55/55a, KB-57/57a, KB-71, and KB-72 were conducted to evaluate remedial progress within the VOC and Lead soil "hot spot" in accordance with Section 8.4. of the RWP. Soils remedial progress within the "hot spot" is documented in Section 6.1.3 of both the July through September (2004 & 2005) Remediation System Evaluation Reports dated November 19, 2004 and December 6, 2005, respectively. Probing was completed using a Bobcat[®] mounted Geoprobe[®] percussive rig. All work was supervised and completed by KERAMIDA personnel. The locations of borings KB-52 through KB-65 and borings KB-71 through 78 are depicted on Figures 4 through 6.

All borings were advanced to a maximum depth of 16 feet below ground surface (bgs). Continuous soil cores were extracted at 4-foot intervals from each boring to obtain soil samples for soil texture identification, field screening, and possible laboratory analysis. Field screening activities included screening with a PID and an olfactory inspection. Boring logs are provided in Attachment 1.

Soil samples were collected from the borings at various depths based on field screening data. All soil samples were submitted to Heritage Environmental Services, LLC Commercial Laboratory Operations (Heritage-CLO) of Indianapolis, Indiana, for VOC analysis using U.S. Environmental Protection Agency (USEPA) SW-846 Method 8260B.

Groundwater was encountered during the sampling events in sand or a mixture of sand and gravel. Groundwater was encountered at an approximate depth of 15 feet bgs in borings KB-52 through KB-59, at an approximate depth of 12 feet bgs in borings KB-60 through KB-65 and KB-77, at an approximate depth of 11 feet bgs in boring KB-78, and at an approximate depth of 10.5 feet bgs in borings KB-73 through KB-76. Groundwater samples were collected using a peristaltic pump through temporary well points equipped with a 4-foot screens (KB-52 through KB-55) and 5-foot screens (KB-60 through KB-65) all set across the zone where groundwater was first encountered in each boring. Groundwater samples were sent to Heritage-CLO for VOC analysis using USEPA SW-846 Method 8260B.

3.1.3 Geoprobe - Eastern source Area

Prior to the commencement of field activities, KERAMIDA contacted IUPPS to mark all underground public utilities at the Site. KERAMIDA performed probing activities at the Site on April 27 and 28, 2005. Probing was completed using a Bobcat® mounted Geoprobe® percussive rig. All work was supervised and completed by KERAMIDA personnel. Mr. William Wieringa with the IDEM and Mr. Bob Lewis with Genuine Parts were also present for part of the day on April 27, 2005. The locations of borings KB-66 through KB-70 are depicted on Figure 7.

Borings were advanced to a maximum depth ranging from 16 to 36 feet bgs. Continuous soil cores were extracted at 4-foot intervals from each boring to obtain soil samples for soil texture identification, field screening, and possible laboratory analysis. Field screening activities included screening with a P10 and an olfactory inspection. Boring logs are provided in Attachment 1.

KERAMIDA collected one soil sample from boring KB-70 for laboratory analysis because of apparent staining. This soil sample was submitted to Heritage-CLO for VOC analysis using USEPA SW-846 Method 8260B.

Groundwater was encountered in sand or a mixture of sand and gravel at approximate depths ranging from 10-12 feet bgs. Groundwater samples were collected from KB-66 through KB-70 using a peristaltic pump through temporary well points equipped with 4-foot screens all set across the zone where groundwater was first encountered in each boring. Additional groundwater samples from each boring, in 4-foot intervals as boring depth increased, were also collected for possible laboratory analysis. These groundwater samples were collected to

vertically identify groundwater impacts. Groundwater samples were sent to Heritage-CLO for VOC analysis using USEPA SW-846 Method 8260B. A groundwater sample was collected on March 18, 2005 from observation well OB-1. OB-1 is north of MW-10-1R and was collected to provide additional data about Site conditions.

3.2 RESULTS

Analytical results from the quarterly groundwater sampling of the monitoring well network are documented quarterly to the IDEM in Remediation System Evaluation Reports. Select analytical results from quarterly groundwater sampling events are presented in this report.

3.2.1 Western Source Area

Exploratory Trenching

During exploratory trenching activities, fill material consisting of soil and occasional automotive debris parts mostly consisting of round flexible discs were encountered near the surface. The locations of the test trenches are depicted on Figure 3. The thickness of the fill ranged from nil to approximately 4 feet. Below the fill was an intermittent silt loam layer underlain by sand and gravel deposits. No residual source materials were found during the exploratory trenching. Screening using the PID did not indicate any detectable vapors from the trenches, except for one detection of note in the trench running north-south near SVE-31. The northern end of this trench is located in the previously identified VOC and Lead soil "hot spot".

Lithology

In general, the Site consisted of loamy materials underlain by sands and gravelly sands at approximately 8 to 14 feet bgs. Some borings had small sand and clay lenses present. Fill was encountered at the top of some of the borings and ranged from nil to 4-feet in thickness. Groundwater was encountered from approximately 10.5 to 15 feet below ground surface in native sands. The sands were found generally continuous with an occasional silt lens. The sand was overlain by up to nine feet of loamy material. A detailed description of the encountered lithology is available on the boring logs presented in Attachment 1.

Analytical Results

Soil samples collected from the western source area were analyzed for VOCs. All soil analytical results are based on dry weight. Several of the borings had multiple depth intervals submitted for laboratory analysis. The following soil samples exceeded the remedial objective for TCE in

the western source area: KB-62 (4-6'), KB-62 (8-10'), KB-63 (8-10'), KB-63 (10-12'), KB-64 (8-10'), KB-64 (10-10.6'), KB-71 (8-10'), KB-72 (6-7'), KB-77 (6-8'), and KB-77 (10-12'). The sample results are presented in Table 1 and depicted on Figures 4 and 5. Copies of the laboratory analytical reports with associated chain-of-custody documentation are included in Attachment 2.

Groundwater samples collected from borings KB-52 through KB-55 and KB-60 through KB-65 were analyzed for VOCs. Several chlorinated hydrocarbons were detected in the groundwater at each of these locations. The chemicals that exceeded the remedial objectives were 1,1-dichloroethene (1,1-DCE) (KB-62), cis-1,2-DCE (KB-53, KB-54, KB-61, KB-62, and KB-65), TCE (KB-52, KB-54, and KB-60 through KB-65), and vinyl chloride (KB-53 through KB-55, KB-62, KB-63, and KB-65). The sample results are presented in Table 2 and depicted on Figure 6. Copies of laboratory analytical reports with associated chain-of-custody documentation are included in Attachment 2. Table 2 also contains historical analytical results from on-Site monitoring wells located in the vicinity of the area investigated. Figure 6 also depicts various historical analytical results from these same on-Site monitoring wells.

3.2.2 Eastern Source Area

Lithology

In general, the Site consisted of sandy clays, sandy clay loams, or clay loams for approximately the first 5-feet of depth. The underlying materials were continuous sands with occasional silt lenses. Groundwater was encountered at approximately 10 to 12 feet bgs in native sands. A detailed description of the encountered lithology is available on the boring logs presented in Attachment 1.

Analytical Results

One soil sample was collected from KB-70 at a depth of 9.75 to 10 feet bgs and was analyzed for VOCs. Analytical results are based on dry weight. No analytes were detected above their respective remedial objectives. The sample results are presented in Table 1 and a copy of the laboratory analytical report with associated chain-of-custody documentation is included in Attachment 2.

Groundwater samples were collected from borings KB-66 through KB-70 and observation point OB-1 in the area up-gradient from MW-10-1R. These samples were submitted for VOC

analysis. All samples contained detectable concentrations of TCE. Sample KB-67W (12-16) was the only sample to contain a TCE concentration above the remedial objective. The sample results are presented in Table 2 and depicted on Figure 7. A copy of the complete laboratory report along with chain-of-custody documentation is included as Attachment 3. Table 2 also contains historical analytical results from MW-10-1R and the sample results from March 2005 are also depicted on Figure 7.

3.3 CONCLUSIONS

Western Source Area

The exploratory trenching and push probe assessments in the western source area did not identify any new areas of residual source materials. However, TCE was detected in soil samples collected from six push probe locations above its remedial objective. Two of the locations, KB-63 and KB-64 are relatively near one another in the area of the Northwest Remediation System. Borings KB-62 and KB-77 are south of the MW-148 in between the Northwestern and Southwestern Remediation Systems. Data from locations intermediate to these two areas indicate that occurrence of TCE in soil above the remedial objective was not extensive. Borings KB-71 and KB-72 are located within the VOC and Lead soil "hot spot."

TCE and/or its daughter products were detected in the push probe groundwater samples at concentrations greater than their respective remedial objectives. Three of these borings, upgradient KB-63 and KB-64 and downgradient KB-65 are located around monitoring well MW-148. Based on groundwater results before and after the RA, TCE and its daughter products were at concentrations below their respective remedial objectives in MW-148. However, starting in September 2005 and through December 2006, vinyl chloride concentrations in groundwater at MW-148/R were above the remedial objective. Currently, VOC concentrations are below their respective remedial objectives in MW-148R

Groundwater TCE concentrations in MW-153 during the RA were above its remedial objective as were TCE groundwater concentrations in KB-52 located near MW-153. Groundwater monitoring at MW-153 following soil assessment activities in December 2004 and March 2005 indicated concentrations of TCE and cis-1,2-DCE below their respective remedial objectives. TCE concentrations in groundwater at MW-153 rose above the remedial objective in June 2005; however, TCE concentrations have been below remedial objectives during the past seven quarterly groundwater sampling events.

No new areas of residual source materials were found, yet VOC impacts above remedial objectives were found in soils and groundwater. Impacts were divided into three general areas: 1) Area 1 around borings KB-62 and KB-77; 2) Area 2 around borings KB-71 and KB-72 (VOC and Lead soil "hot spot"); and 3) Area 3 around borings KB-63 and KB-64. These areas are depicted on Figure 8. Based on RA and quarterly groundwater sampling results including lithology, options to attain remedial objectives were evaluated and the excavation of impacted soils with off-Site disposal was selected along with the continued operation of the Southwestern Remediation System.

Eastern Source Area

The push probe assessment in the eastern source area did not identify any new areas of residual source materials. TCE was detected in soil in one push probe location at a concentration well below its remedial objective. All but one of the groundwater samples collected from the push probe borings contained contaminant concentrations below their respective remedial objective. Sample KB-67W contained a TCE concentration of 400 ug/L versus the 260 ug/L remedial objective. A sample collected from MW-10-1R around the same time period (March 2005) contained an average TCE concentration of 130 ug/L, well below its remedial objective.

Based on the results from quarterly groundwater monitoring conducted following RA activities, the Eastern Remediation System was shut down on January 30, 2006, based on four consecutive quarters of groundwater VOC concentrations below remedial objectives. As shown in Table 2, groundwater VOC concentrations, for the fifth quarter since the system was shut down, remained below remedial objectives.

4.0 SOIL EXCAVATION ACTIVITIES

Upon review of the data from the RA and quarterly groundwater monitoring events, discussed in Section 3.3 of this report, the appropriate remedial option selected to attain remedial objectives in the western source area was to remove residual TCE-impacted soils. This section describes soil removal, confirmation sampling and results associated with TCE-impacted soil excavation activities. KERAMIDA has also conducted quarterly sampling events of the monitoring well network following excavation activities to monitor the western source area.

4.1 FIELD METHODS

Prior to initiation of work, KERAMIDA contacted IUPPS to mark all underground public utilities at the Site. KERAMIDA held daily Site safety meetings, including the review of the Site-specific health and safety plan, prior to the commencement of and during field activities.

Field methods used during the quarterly groundwater sampling of the monitoring well network are documented quarterly to the IDEM in Remediation System Evaluation Reports.

4.1.1 Soil Waste Characterization Sampling

KERAMIDA performed probing activities at the Site on June 28, 2006 to collect waste characterization samples, WCS-1 through WCS-3, to profile TCE-impacted soils in the western source area for off-Site disposal. Probing was completed using a Bobcat® mounted Geoprobe® percussive rig. All work was supervised and completed by KERAMIDA personnel. The locations of the samples are depicted on Figure 4.

Based on investigative results discussed in Section 3.0 of this report, the western source area was divided into three separate excavation areas, Area 1, Area 2 and Area 3 as depicted on Figure 8. Therefore, one soil boring was advanced within each area to a maximum depth of 16 feet bgs. Continuous soil cores were extracted at 4-foot intervals from each boring to obtain soil samples for laboratory analysis. Soil samples across the impacted interval within each boring were composited to form a waste characterization sample. Boring locations and the soil intervals sampled were determined using previous investigation results. All soil waste characterization samples were submitted to Heritage-CLO for Paint Filter by USEPA SW-846 Method 9095, Ignitability by USEPA SW-846 Method 1010, Corrosivity by USEPA SW-846 Method 1110, Reactive Cyanide by USEPA SW-846 Method 335.2, Reactive Sulfide by USEPA SW-846 Method 376.1, TCLP VOCs by USEPA SW-846 Method 1311, TCLP Polynuclear Aromatic Hydrocarbons (PNAs) by USEPA SW-846 Method 1311, and TCLP SW-846 Cadmium, Chromium, and Lead by USEPA Method 1311 analysis.

Results from the three waste characterization samples indicated that TCE-impacted soils in the area of the VOC and Lead soil "hot spot" required disposal as a non-hazardous waste and the TCE-impacted soils in the remaining two areas required disposal as hazardous wastes. These results were used to profile the TCE-impacted soils for disposal at the Heritage Environmental

Services, LLC Subtitle "C" landfill (Heritage) facility located in Roachdale, Indiana. A copy of the laboratory analytical report with associated chain-of-custody documentation is provided in Attachment 3.

As discussed in Section 4.1.2 below, the initial limits of excavation Area 1, Area 2 and Area 3 expanded, therefore, several test trenches, TT-3, TT-6, TT-7, TT-8 and TT-9 were excavated for the collection of waste characterization samples to aid in determining whether TCE-impacted soils in the expanded areas required disposal as hazardous or non-hazardous waste. Soil waste characterization samples were submitted to ENVision Laboratories, Inc. located in Indianapolis, Indiana for Paint Filter by USEPA SW-846 Method 9095, Ignitability by USEPA SW-846 Method 1010, Corrosivity by USEPA SW-846 Method 1110, TCLP VOCs by USEPA SW-846 Method 1311 and TCLP SW-846 Cadmium, Chromium, and Lead by USEPA Method 1311 analysis. Copies of laboratory analytical reports with associated chain-of-custody documentation are provided in Attachment 3.

Results were submitted and discussed with Heritage prior to these soils in these areas being excavated. Figures 8 and 9 depict the final excavation limits and areas within those limits that were disposed of as hazardous and non-hazardous wastes.

4.1.2 Soil Removal

KERAMIDA supervised the abandonment of wells, stockpiling of clean overburden materials, the removal and disposal of TCE-impacted soil, backfilling, compaction and resurfacing activities and collected confirmatory soil samples during the period from August 21 through October 16, 2006. Earth Exploration, Inc. (Earth Exploration), of Indianapolis, Indiana performed well abandonment activities and Hoosier Equipment Service, Inc. (Hoosier) of Indianapolis, Indiana and its subcontractors conducted soil stockpiling, excavation, backfilling, compaction and resurfacing activities, all under the direct supervision of Mr. Steve Cobb, Project Manager, and Mr. Robert Fedorchak, Senior Engineer/Project Manager with KERAMIDA. All excavated TCE-impacted soils were disposed of at Heritage using trucks supplied by Heritage. A photographic log of the soil removal activities is provided in Attachment 4.

Prior to activities in a proposed excavation location, any well or wells located within the proposed excavation area were abandoned. A total of three, two-inch diameter monitoring wells, MW-132, MW-147A, and MW-148 and seven two-inch SVE wells, SVE-1 through SVE-7 were

abandoned by a licensed well driller in accordance with Indiana Department of Natural Resources (IDNR) requirements. The metal protective covers and top portion of well riser were removed from the ground and disposed. The well casing was then filled with bentonite to near the ground surface. Well abandonment forms for each well were subsequently submitted to the IDNR. Well locations are depicted on Figures 8 and 9. Copies of abandonment records are provided in Attachment 5.

Following well abandonment activities and prior to the excavation of TCE-impacted soils in a particular area, clean overburden materials were removed and stockpiled. All excavated materials were stockpiled on and covered by visqueen and reused as backfill as detailed below. Two to eight feet of clean overburden materials were removed and stockpiled. The depth of the overburden material removed was based on previous sampling in areas that were previously excavated and backfilled in 2000 to remove auto parts and drums and results from soil sampling detailed in Section 3.0 of this report.

Following the excavation and stockpiling of clean overburden materials in a particular area, TCE-impacted soils were excavated and direct loaded in landfill provided trucks. Excavation activities were directed based on real-time analytical results provided by an on-Site mobile laboratory from soil samples collected during soil excavation as discussed below. Sierra Mobile Labs, Inc. was used as the on-Site laboratory. Confirmatory soil samples were then collected based on these results and submitted to Heritage-CLO.

During excavation activities, KERAMIDA advanced an additional 13 borings, KB-A through KB-M, using a Bobcat® mounted Geoprobe® percussive rig. Boring logs are provided in Attachment 1. Soils samples were also collected from excavation sidewalls and test trenches (TT-1 through TT-9). These samples were all collected to aid in determining excavation limits. All soil samples were field screened using a PPD and analyzed by the on-Site mobile laboratory. Based on field screening and on-Site mobile laboratory analytical results, the initial limits of excavation Area 1, Area 2 and Area 3 expanded.

A total of 3,670 tons of TCE-impacted hazardous soil and 4,814 tons of TCE-impacted non-hazardous soil were disposed of from an excavation measuring approximately 80 feet by 195 feet with an approximate depth ranging from 12 to 14 feet. The excavation areas are depicted on Figures 8 and 9. Soil disposal documentation is provided in Attachment 6.

During removal activities, an underground concrete tile pipe was discovered within the southeastern portion of the excavation. The piping appeared to be components of a former drainage or sewer system. No visible staining or contents were associated with the piping. In addition, miscellaneous parts and a drum were found along the western portions of the excavation near the right-of-way of Holt Road. All these materials were removed and disposed of with the TCE-impacted soils.

Following soil removal and confirmatory sampling activities, the excavation was brought to grade by backfilling with the stockpiles of clean overburden materials and clean fill brought in from off-Site. Site surface was restored with topsoil/grass and asphalt as depicted on Figures 8 and 9.

4.1.3 Confirmatory Soil Sampling

KERAMIDA collected confirmatory soil samples from the excavation throughout the soil removal process. Confirmatory soil samples were collected directly from the excavator bucket, by KERAMIDA personnel, by hand using disposable nitrile gloves. New gloves were used for each individual sample collected. Confirmation soil sampling procedures were completed in general accordance with the IDEM RISC User's Guide, final dated February 15, 2001. All soil samples were submitted to Heritage-CLO for VOC analysis using USEPA SW-846 Method 8260B.

Final confirmatory soil sample locations, depths, rationale, and analysis are summarized in Table 3. Soil samples were submitted through proper chain-of-custody procedures to Heritage-CLO for analysis. Analytical results are summarized on Table 4 and depicted on Figure 9. Copies of laboratory analytical reports with associated chain-of-custody documentation are provided as Attachment 7.

A total of 29 confirmatory soil samples were collected from the sidewalls of the excavation area. No bottom samples were collected from the excavation since the bottom limits of the excavation extended into the groundwater, which was located at a range of 10 to 12 feet bgs. In addition, duplicate samples and matrix spike and matrix spike duplicates were collected for quality assurance and quality control.



4.1.4 Monitoring Well Installation Methods

Earth Exploration installed three monitoring wells, MW-132R, MW-147AR, and MW-148R, on October 10 and 11, 2006 to replace the monitoring wells previous abandoned prior to soil excavation activities. The monitoring well locations are depicted on Figures 8 and 9.

Using a 4-1/4 inch hollow-stem auger, a two-inch diameter PVC well casing was installed in the boring. The monitoring wells were blind drilled and screened to the same depths as the previous monitoring wells, MW-132, MW-147A, and MW-148. The casing for MW-132R was screened from 9.5-19.5 feet bgs, MW-147AR was screened from 20-30 feet bgs, and MW-148R was screened from 10.5 to 25.5 bgs. The screen for each well was a machine cut 10-slot screen. Washed #4 quartz sand was placed around the well casing from two foot above the top of the screen to the bottom of the boring. A bentonite chip seal was placed on top of the sand to approximately one-foot below ground surface. Finally, a flush-mounted protective cover (8-inch I.D. manhole) was cemented in place. The well construction diagrams are included in Attachment 1. The wells were developed with a pump, after installation. Approximately 20 gallons of groundwater was purged from MW-132R, approximately 35 gallons of groundwater was purged from MW-147AR, and approximately 30 gallons was purged from MW-148R for monitoring well development. All soil cuttings were containerized in DOT approved 55-gallon drums and disposed of at Waste Management, Inc.'s Twin Bridges RDF located in Danville, Indiana. Soil cutting disposal documentation is provided in Attachment 6. All development water was containerized in an on-Site storage tank for disposal as documented in Section 6.1.4 of the Remediation System Evaluation Reports dated December 20, 2006 and February 19, 2007.

After MW-132R, MW-147AR, and MW-148R were installed, the top-of-casing for each monitoring well was surveyed and tied into the existing Site's monitoring well network. Groundwater level measurements were made from the top of each well casing in order to determine local groundwater flow.



4.2 RESULTS

Analytical results from the quarterly groundwater sampling of the monitoring well network are documented quarterly to the IDEM in Remediation System Evaluation Reports. Select analytical results from quarterly groundwater sampling events are presented in this report.

4.2.1 Confirmatory Soil Sampling

The VOC analytical results for the confirmation soil samples are summarized in Table 4 and are depicted in Figure 9. All soil analytical results are based on dry weight. The IDEM VRP Tier II Cleanup Goals for VOCs are provided at the bottom of the table for comparison with detected compounds. Laboratory analytical reports are provided in Attachment 7.

As shown in Table 4, VOC constituents were detected in 24 of the 29 confirmatory soil samples collected from the soil excavation. The chemical of concern during soil excavation activities, TCE, was detected in 23 of the 29 confirmatory soil samples at concentrations below its remedial objective. Vinyl chloride was detected in one confirmatory soil sample (A3-WW-5) at a concentration exceeding its remedial objective. The remaining VOC constituents detected in the confirmatory soil samples were detected at concentrations below their remedial objectives.

4.2.2 Quarterly Groundwater Sampling

Three quarterly groundwater sampling events have been conducted in the western source area following the removal and off-Site disposal of TCE-impacted soils. Groundwater VOC concentrations continue to be below the remedial objectives in MW-132R, MW-133R, MW-145, MW-147AR, MW-153 and MW-302. Vinyl chloride concentrations in groundwater at MW-148R were above its remedial objective in the first 2 events, however; the third event conducted in March 2007 indicated that the vinyl chloride concentration is below its remedial objective.

4.3 CONCLUSIONS

A total of 3,670 tons of TCE-impacted hazardous soil and 4,814 tons of TCE-impacted non-hazardous soil were removed and disposed of off-Site at a Subtitle "C" Landfill. The TCE-impacted soil occurrence identified in the western source area has been remediated to concentrations below remedial objectives. However, one VOC constituent, vinyl chloride, was detected at a concentration above its remedial objective in one small area. Vinyl chloride was detected from soil collected from the sidewall of the excavation at the Holt Road entrance. Due

to the close proximity of the right-of-way for Holt Road further excavation was not feasible. No further remediation of soil associated with the western source area appears warranted.

Quarterly groundwater sampling events conducted in the western source area following the removal and off-Site disposal of TCE-impacted soils have indicated that groundwater VOC concentrations are below remedial objectives.

5.0 USE OF REPORT

This report has been prepared for the exclusive use of the Client and persons or organizations to whom the Client wishes to make this report available. This report and the findings, conclusions and recommendations contained herein shall not, in whole or in part, be disseminated or conveyed to any other party, or used by or relied upon by any other party, without the prior written consent of KERAMIDA.

6.0 LIMITATIONS

This report was prepared in accordance with KERAMIDA contractual guidelines set forth for remediation services. KERAMIDA's professional opinions contained herein are based upon the operation, maintenance, and monitoring/sampling conducted by KERAMIDA personnel during the operation of the remediation system. No other warranty is given or implied by this report.

Table 3
Final Confirmatory Sampling and Analysis Summary
Former General Motors Corporation
Allison Gas Turbine Division, Plant 10
Indianapolis, Indiana
IDEM VRP # 6991004
KERAMIDA Project No. 2829E

Sample Identification	Sample Location	Method	Sample Depth (ft)	Sampling Rationale	Lab Testing
KS-1	South Sidewall of Area 1 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
KS-2	South Sidewall of Area 1 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
KS-3	West Sidewall of Area 1 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
KS-4	West Sidewall of Area 1 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
KS-8	Southern Portion - East Sidewall of Area 1 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
KS-9	Southern Portion - East Sidewall of Area 1 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
KS-10	Northern Portion - East Sidewall of Area 1 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
KS-11	Northern Portion - East Sidewall of Area 1 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
A1/A3 East Wall-1	East Sidewall Between Area 1 & Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A1/A3 East Wall-2	East Sidewall Between Area 1 & Area 3 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC
A3-WW-1 (5')	Southern Portion-West sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-WW-2 (11')	Southern Portion-West sidewall of Area 3 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC
A3-WW-3 (10')	Southern Portion-West sidewall of Area 3 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
A3-WW-4	Northern Portion-West sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-WW-5	Northern Portion-West sidewall of Area 3 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
A3-WW-5 DUP	Duplicate of A3-WW-5	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
A3-NW-1	Western Portion-North sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-NW-2	Western Portion-North sidewall of Area 3 (bottom sample)	Excavator Bucket	10	Confirmation Sample - Sidewall	VOC
A3-NW-3	Eastern Portion-North Sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-NW-4	Eastern Portion-North Sidewall of Area 3 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC
A3-EW-1	Northern Portion-East Sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-EW-2	Northern Portion-East Sidewall of Area 3 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC
A3-EW-3	Southern Portion-East Sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-EW-4	Southern Portion-East Sidewall of Area 3 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC
A3-SW-1	Southeast Portion-South Sidewall of Area 3 (top sample)	Excavator Bucket	5	Confirmation Sample - Sidewall	VOC
A3-SW-2	Southeast Portion-South Sidewall of Area 3 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC

Table 3
Final Confirmatory Sampling and Analysis Summary
Former General Motors Corporation
Allison Gas Turbine Division, Plant 10
Indianapolis, Indiana
IDEM VRP # 6991004
KERAMIDA Project No. 2829E

Sample Identification	Sample Location	Method	Sample Depth (ft)	Sampling Rationale	Lab Testing
A2-SW-1 (6)	South Sidewall of Area 2 (top sample)	Excavator Bucket	6	Confirmation Sample - Sidewall	VOC
A2-SW-2 (11)	South Sidewall of Area 2 (bottom sample)	Excavator Bucket	11	Confirmation Sample - Sidewall	VOC
A2-WW-1 (4)	West Sidewall of Area 2 (top sample)	Excavator Bucket	4	Confirmation Sample - Sidewall	VOC
A2-WW-2 (9)	West Sidewall of Area 2 (bottom sample)	Excavator Bucket	9	Confirmation Sample - Sidewall	VOC

ft = Feet
KS = KERAMIDA Sample
(Dup) = Duplicate Sample

VOC = Volatile Organic Compounds; U.S. EPA SW 846 Method 8260B
NA = Not Applicable
QA/QC = Quality Assurance/Quality Control

Table 1
VOCs in Subsurface Soil (mg/kg)
Former General Motors Corporation
Albion Gas Turbine Division, Plant 10
Indianapolis, Indiana
IDEM VPP #6991004
KBR/MDA Project No. 2829E

[illegible]

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WPCs & Related Polymers: Comparison

Samples analyzed using ICP-AES (W-44, Model, KJ200)

mylog = c(loglikmax, getLoglikmax)

MS = Main Menu; PA = Program Application

¹⁰⁰ Indian Department of Environmental Management, February.

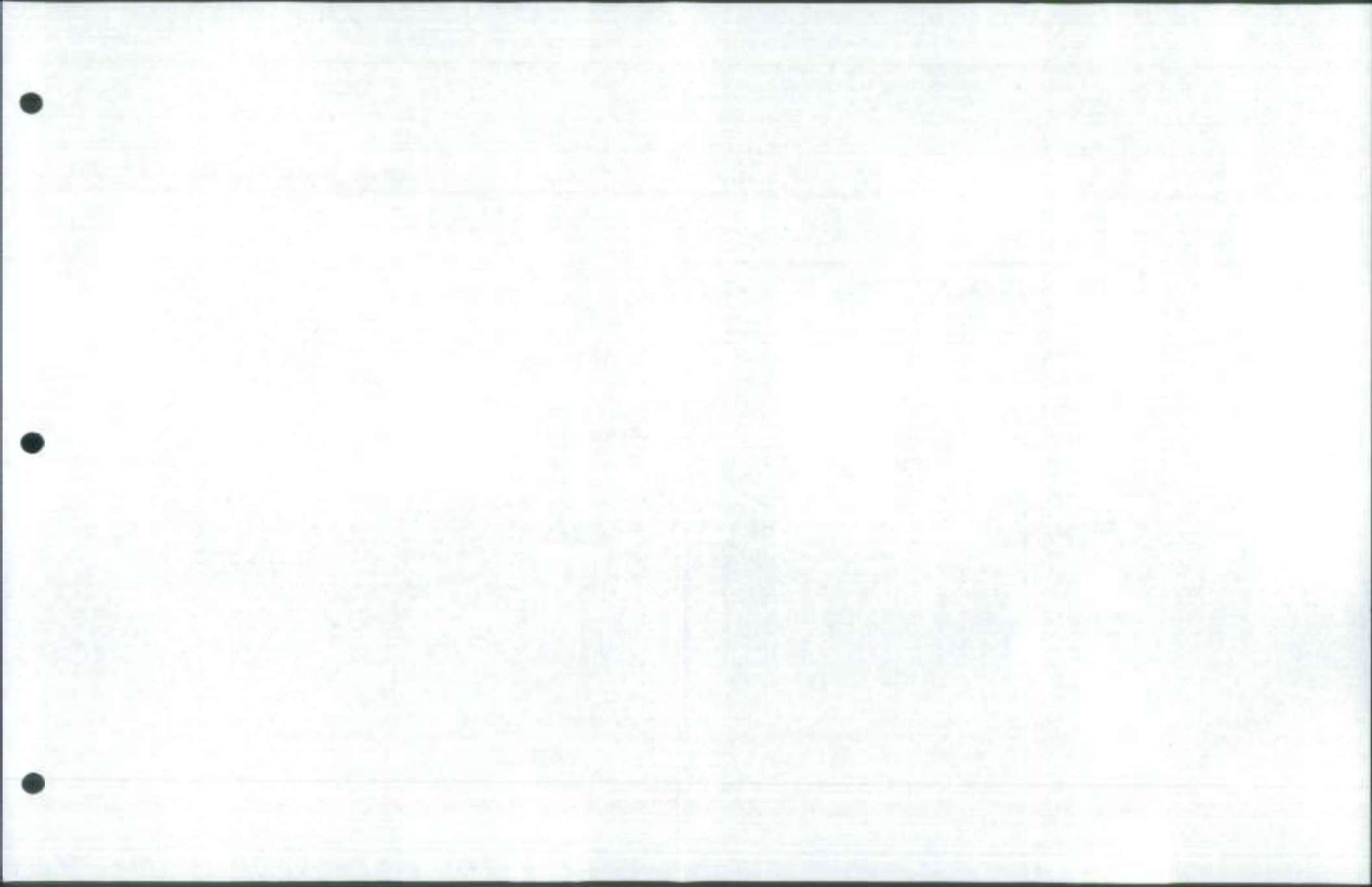
Project: Research Guide, Appendix F The McGraw-Hill Companies

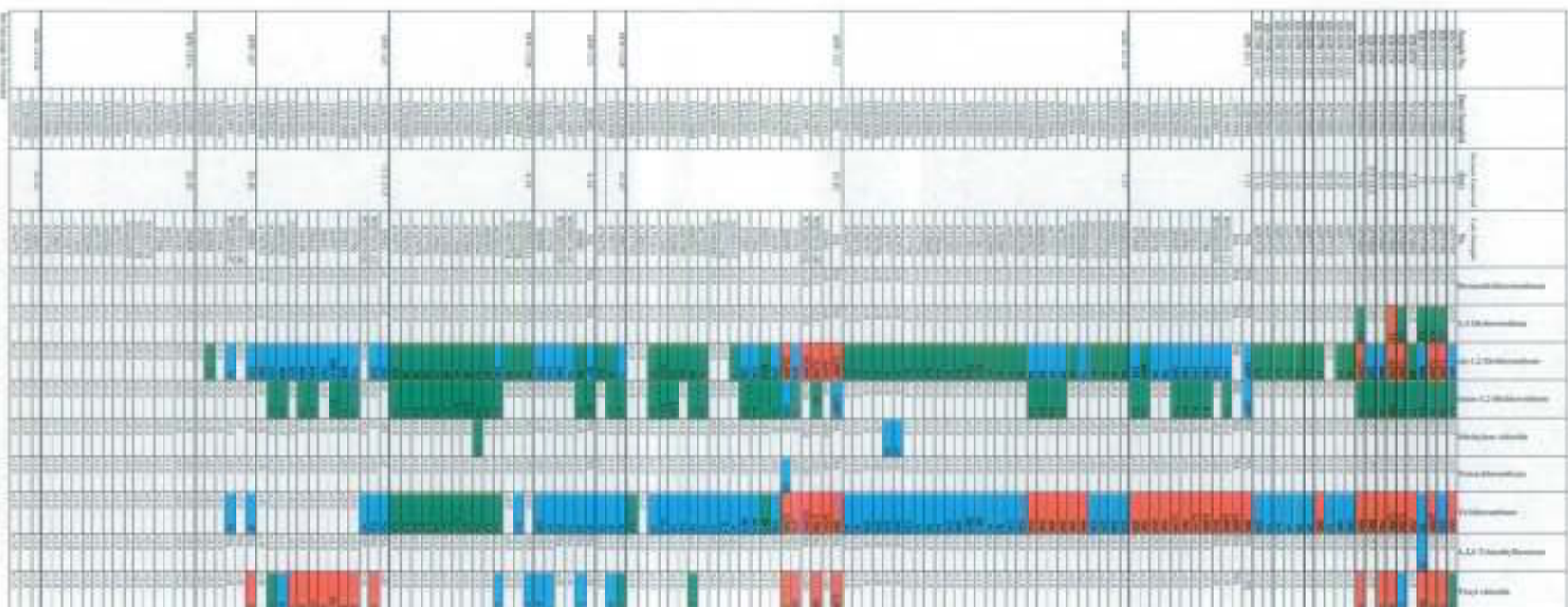
Revised by Office of Environmental Management, July 1998

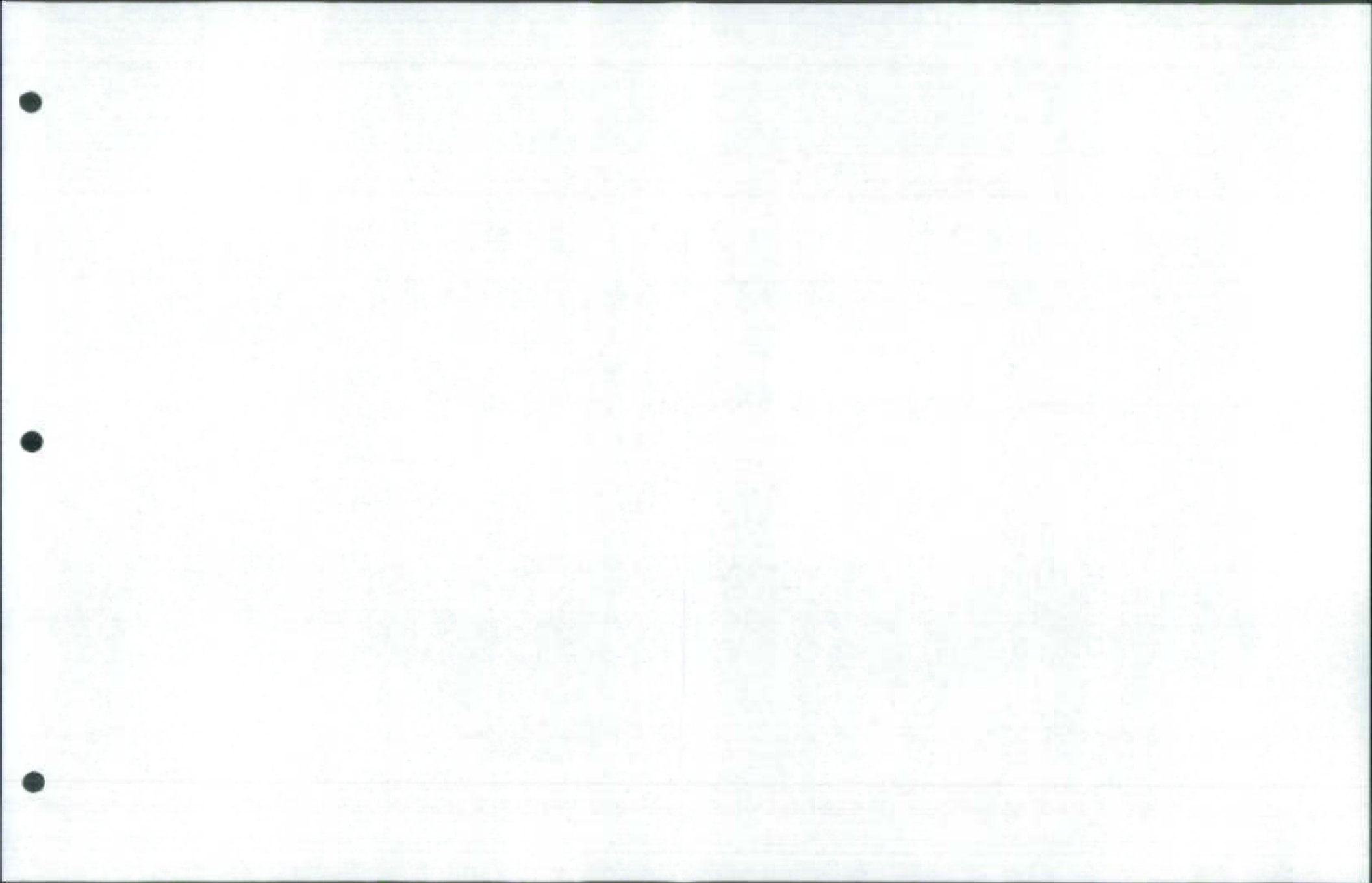
¹⁰⁰ Calculated using average activity values for Ten T. magnipennis.

¹⁰ Bureau of the Census, *Report of the President's Council on Economic Policy* (October 1999).

1







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the authors of the book, the book is not a technical manual. It is a book for the general public, and it is a book that is written in a very accessible and readable style. The authors are experts in their field, and they have written a book that is both informative and entertaining. The book is a must-read for anyone who is interested in the history of the world, and it is a book that is well worth the price.

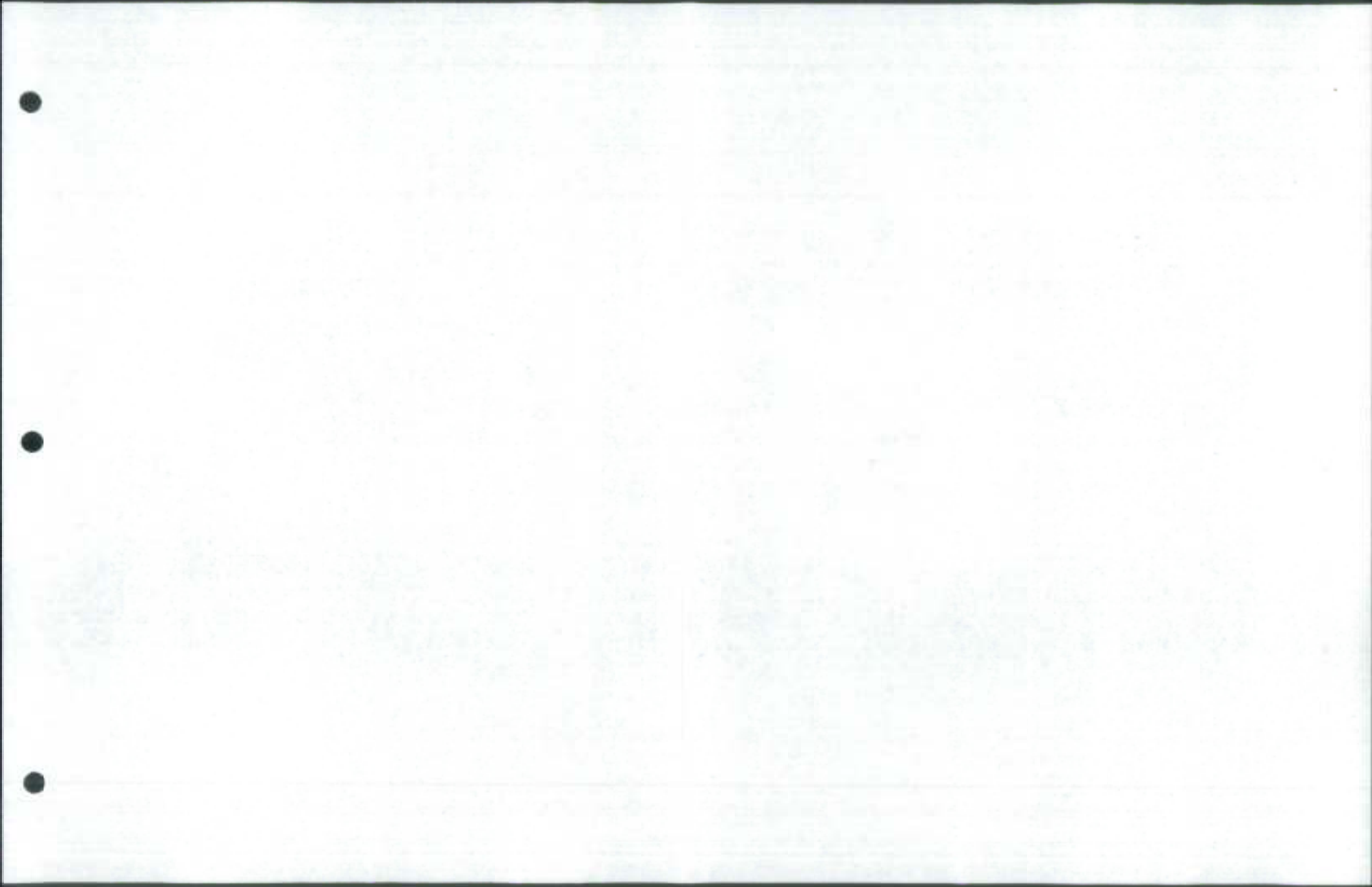
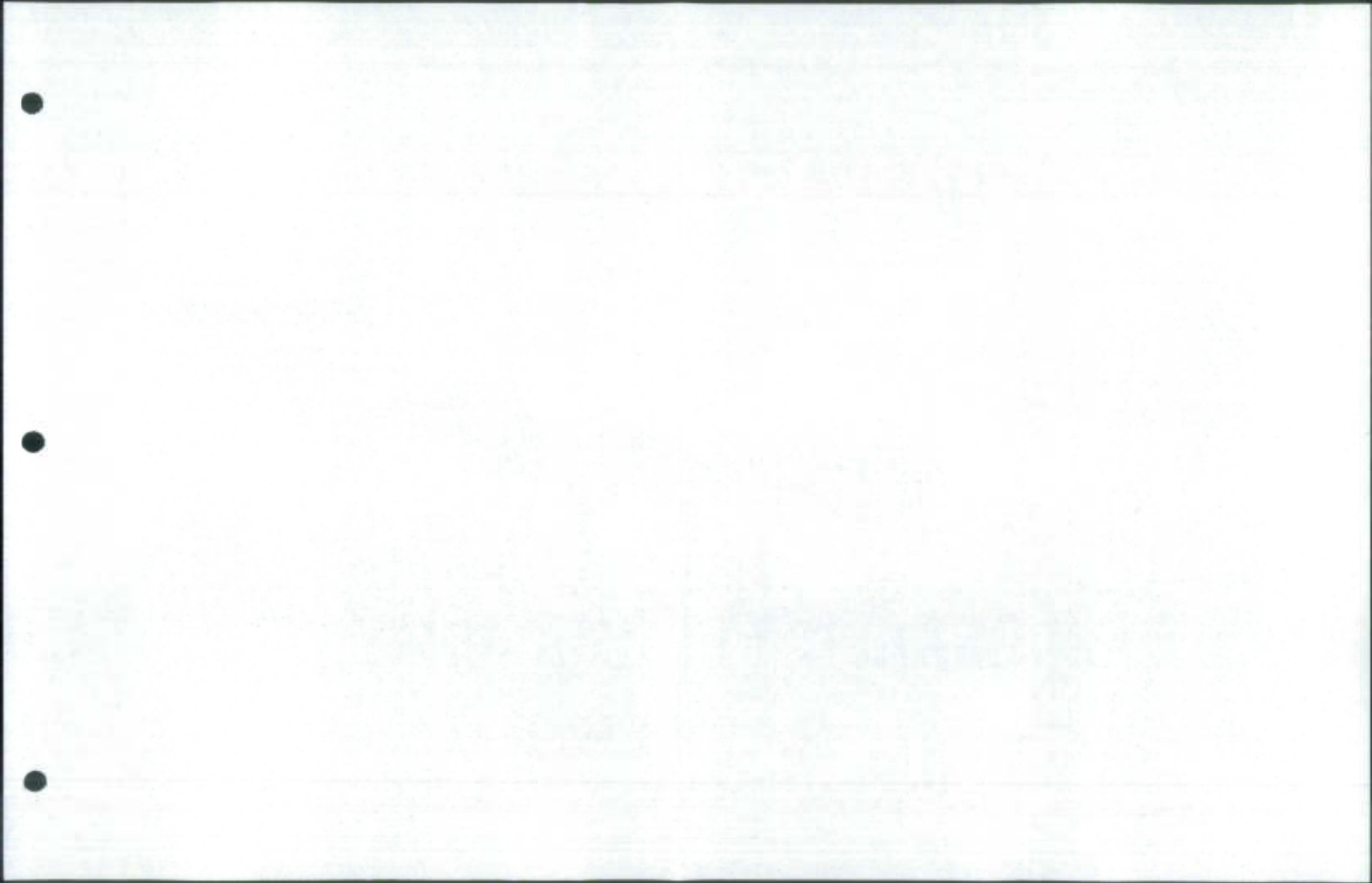
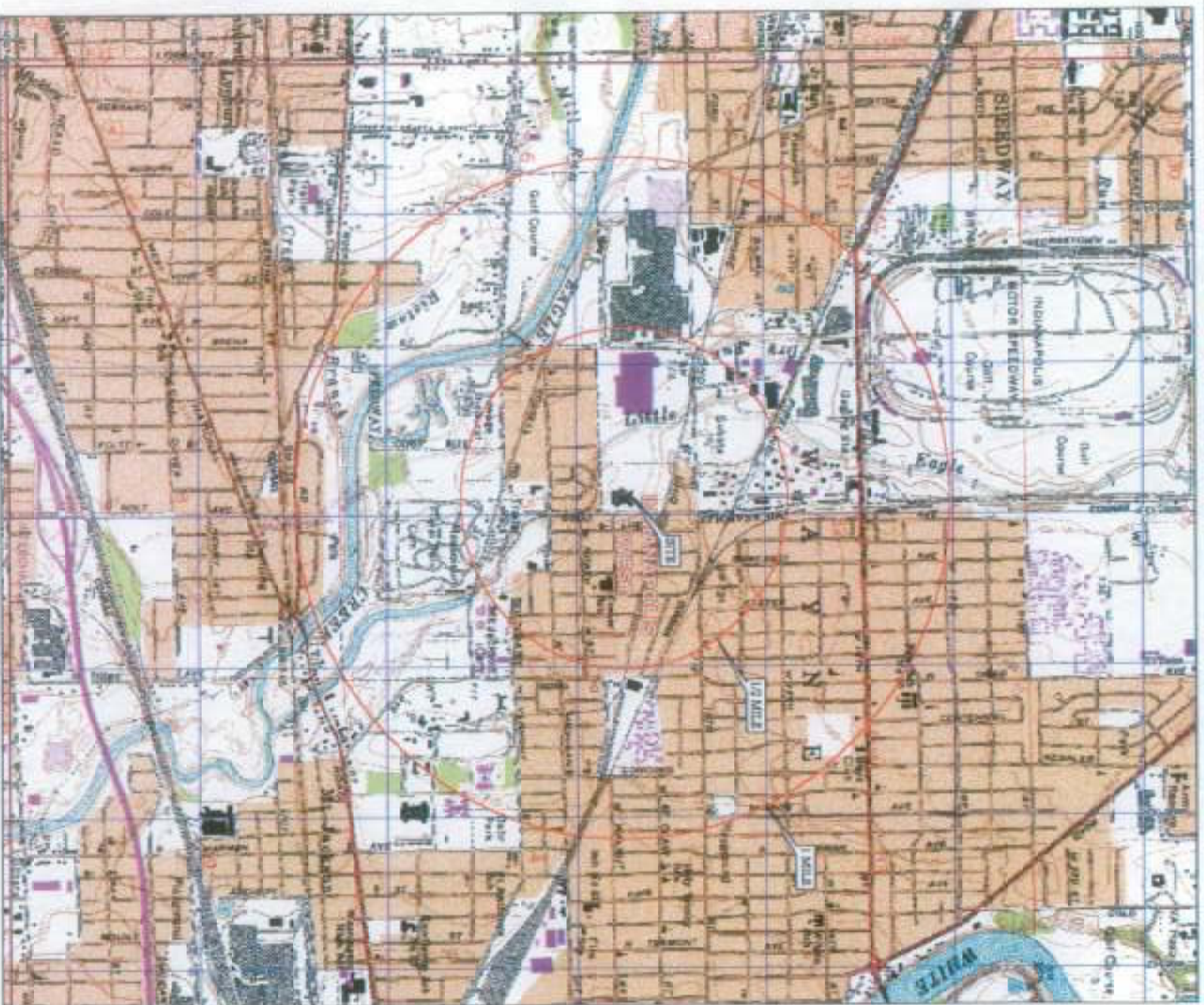


Table 4
VCCs in Confinement Cell Sample - Western Source Area (mg/kg)
Factor General Motors Corporation
Alford Gas Turbine Division, Plant 11
Indianapolis, Indiana
EPC 900 600100
EPA/AMDA Project No. 2020E

[illegible][illegible]





1:50 Topographic Copyright © 1988 Delorme, Vermont, ME 05401 Source Data USGS

1 inch = 1/4 mile 1:25,000 Detail 1:50,000 Detail 1:50,000 Detail

Figure 1

Site Location Map

Former General Motors Corporation

Allison Gas Turbine Plant 10

700 North Olin Avenue

Indianapolis, IN

N.

Prepared by:

Becky Caswell

Approved by:

Kyle Bruckner

Date:

8/29/2003

Project Number:

2829E

HERMANIA Environmental, Inc.

300 North College Avenue

Indianapolis, Indiana 46202

(317) 686-6000 FAX (317) 686-6010

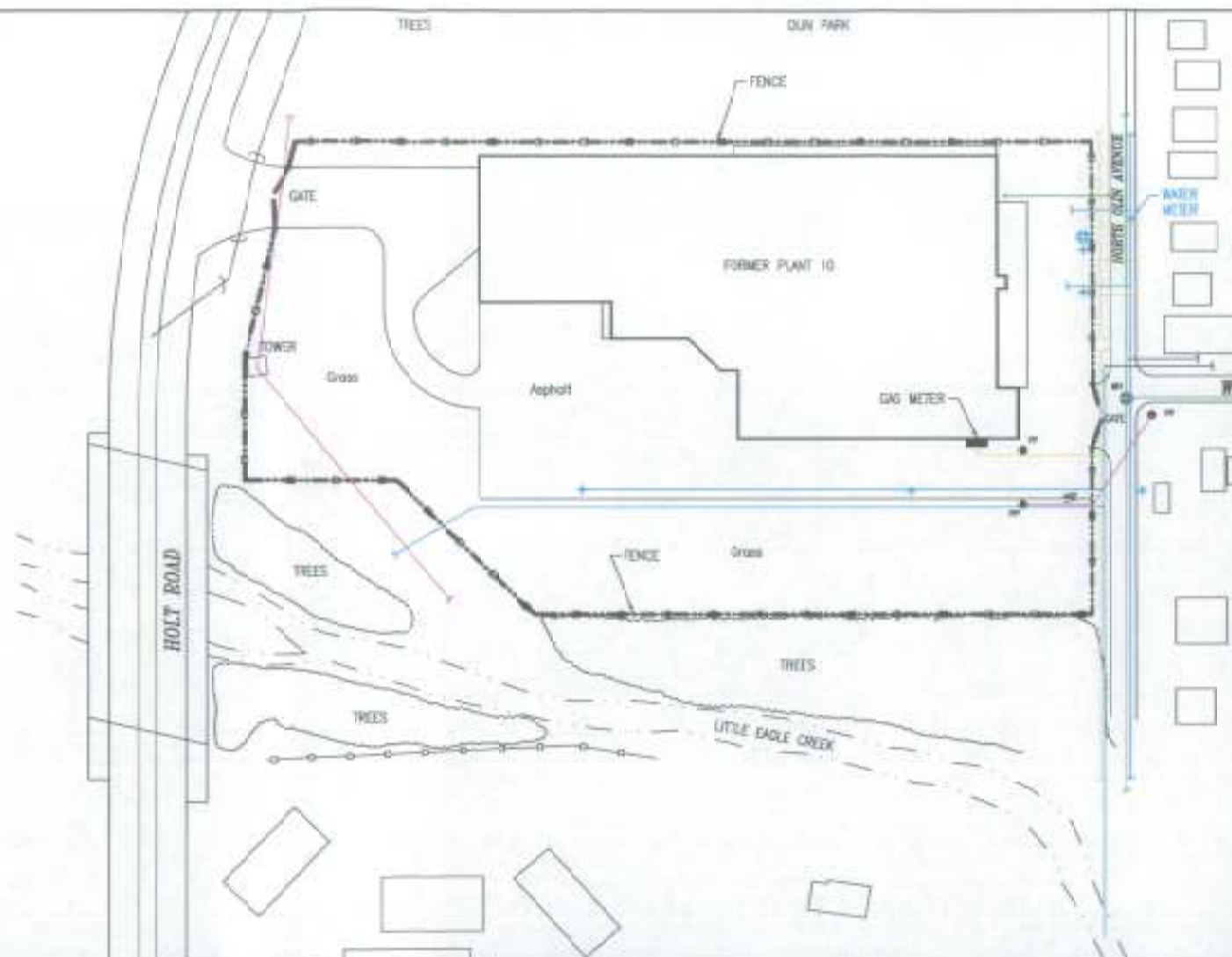




LEGEND

- MANHOLE
- WATER HYDRANT
- POWER POLE
- STORM SEWER / DITCH LINE
- GAS LINE
- WATER LINE
- OVERHEAD ELECTRIC
- SANITARY SEWER LINE
- PROPERTY LINE

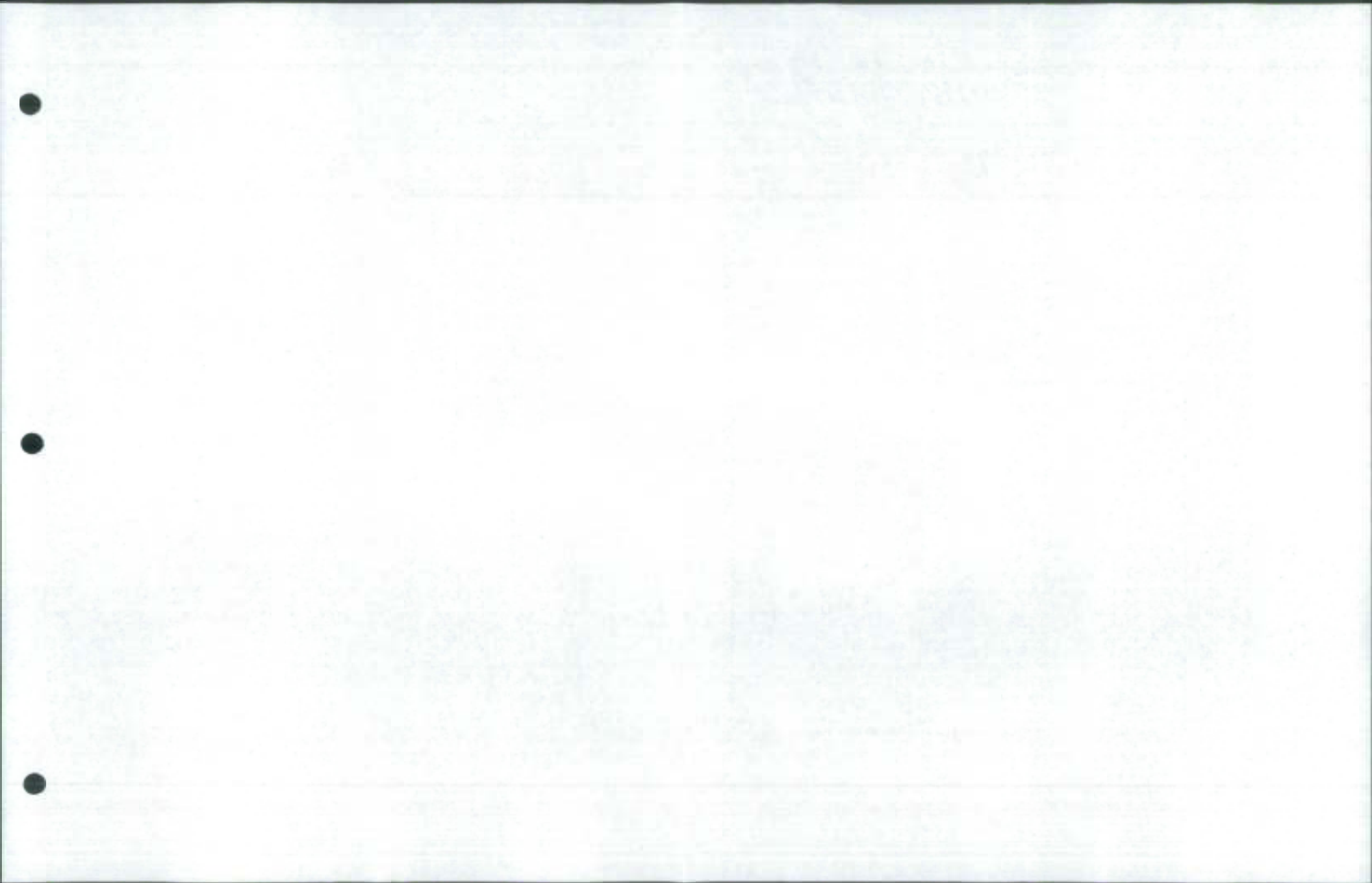
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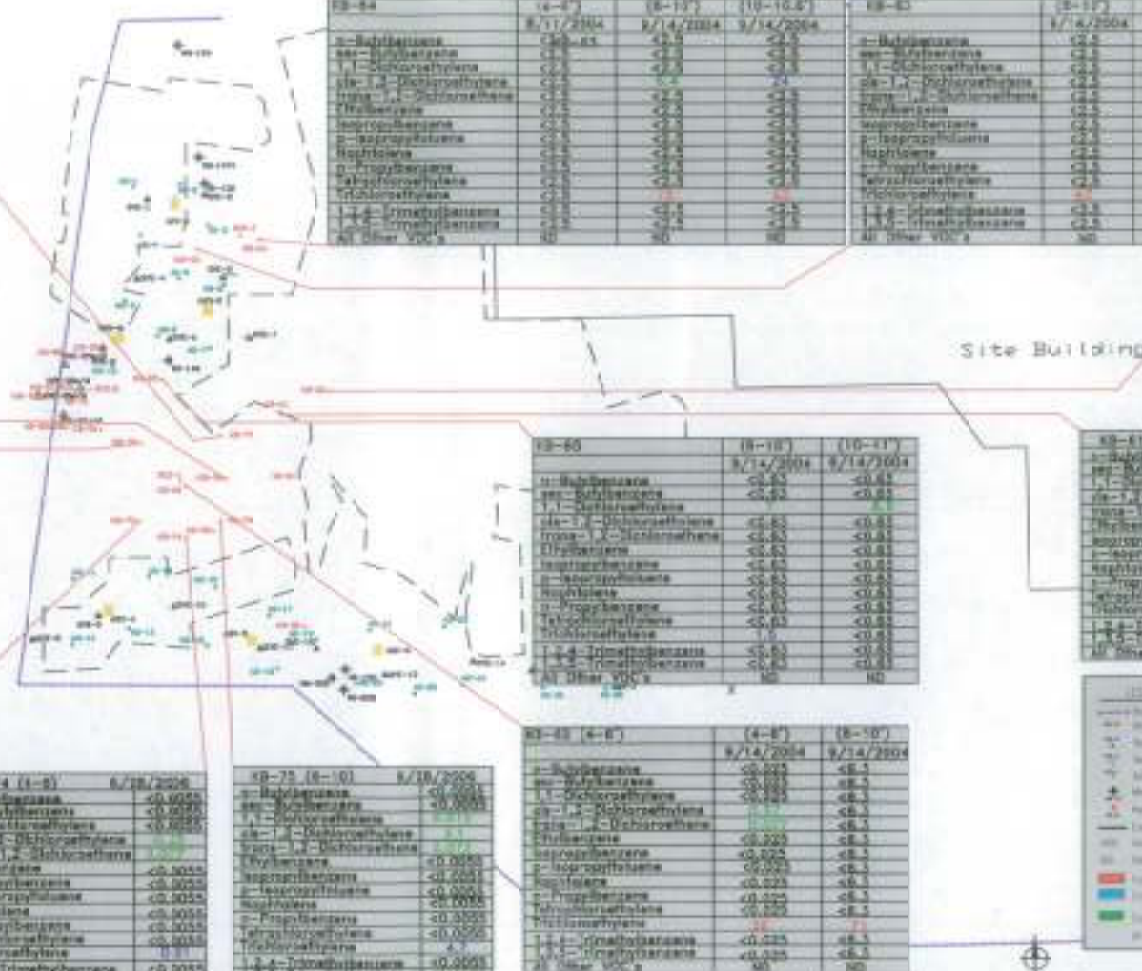


DRAWN BY: M-LJ
APPROVED BY: FDW
FILE #: 2829E
DATE APPROVED: 10/01/82



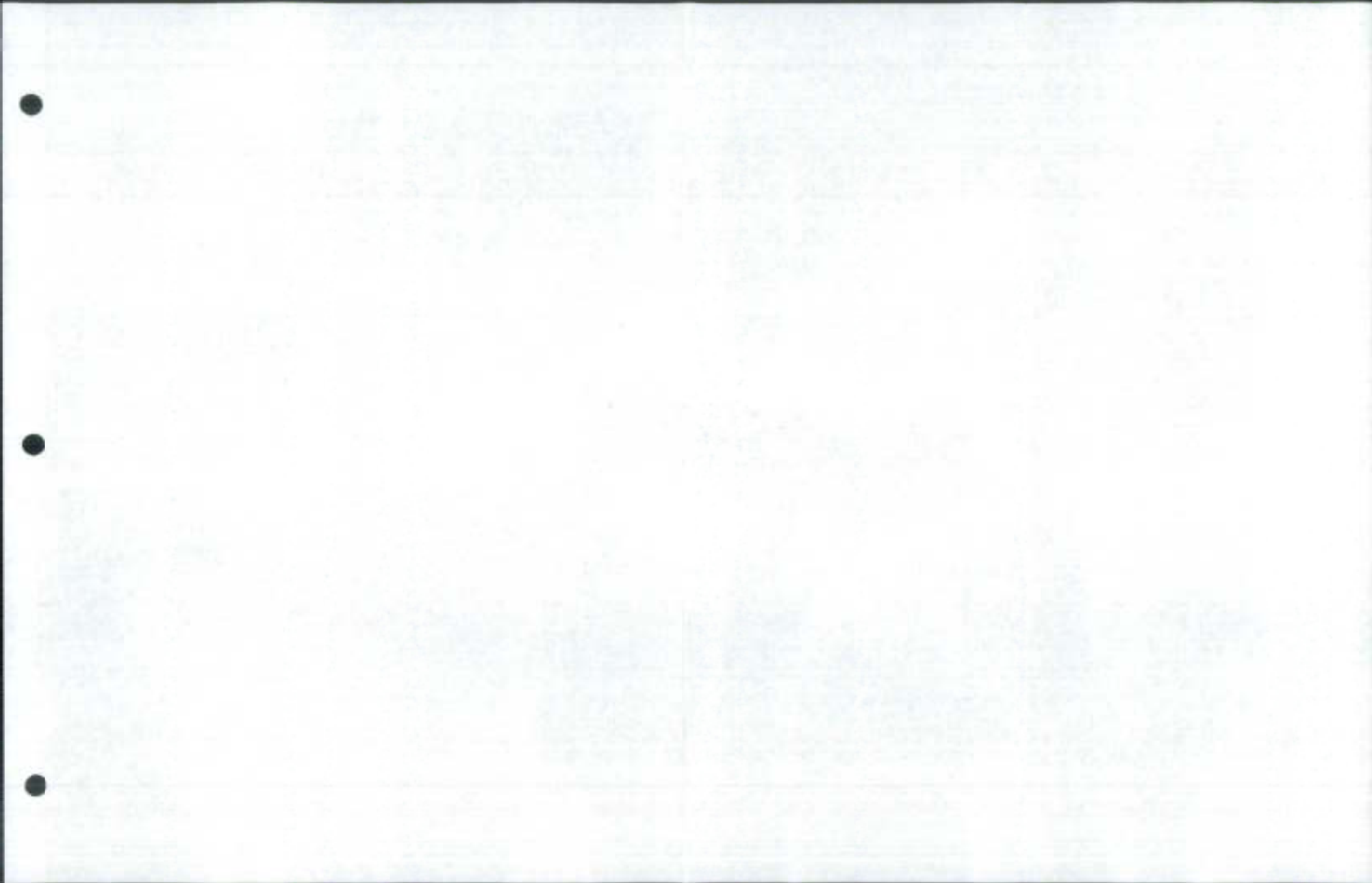
Figure 2
SITE MAP
Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Din Avenue
Indianapolis, Indiana

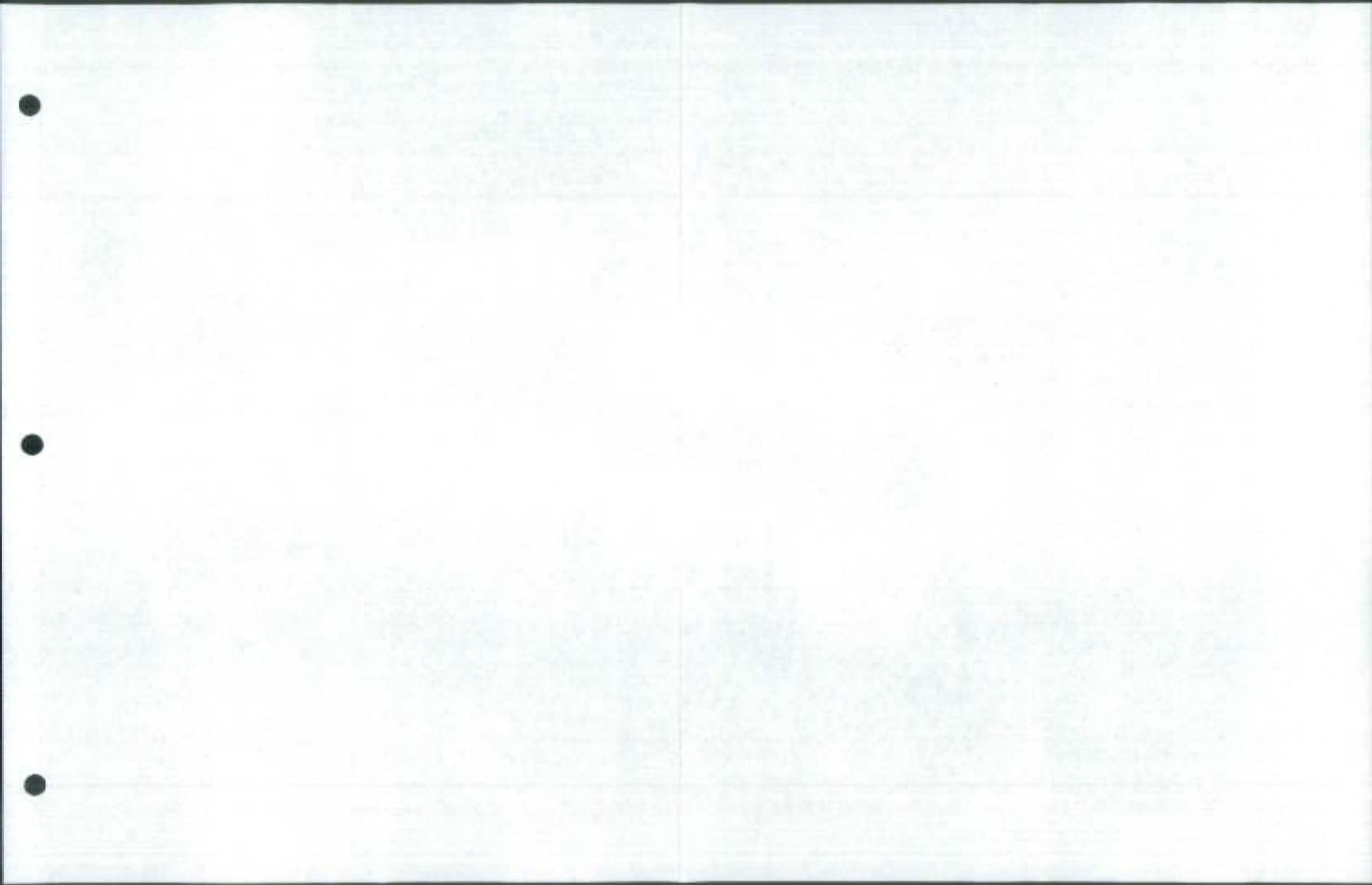


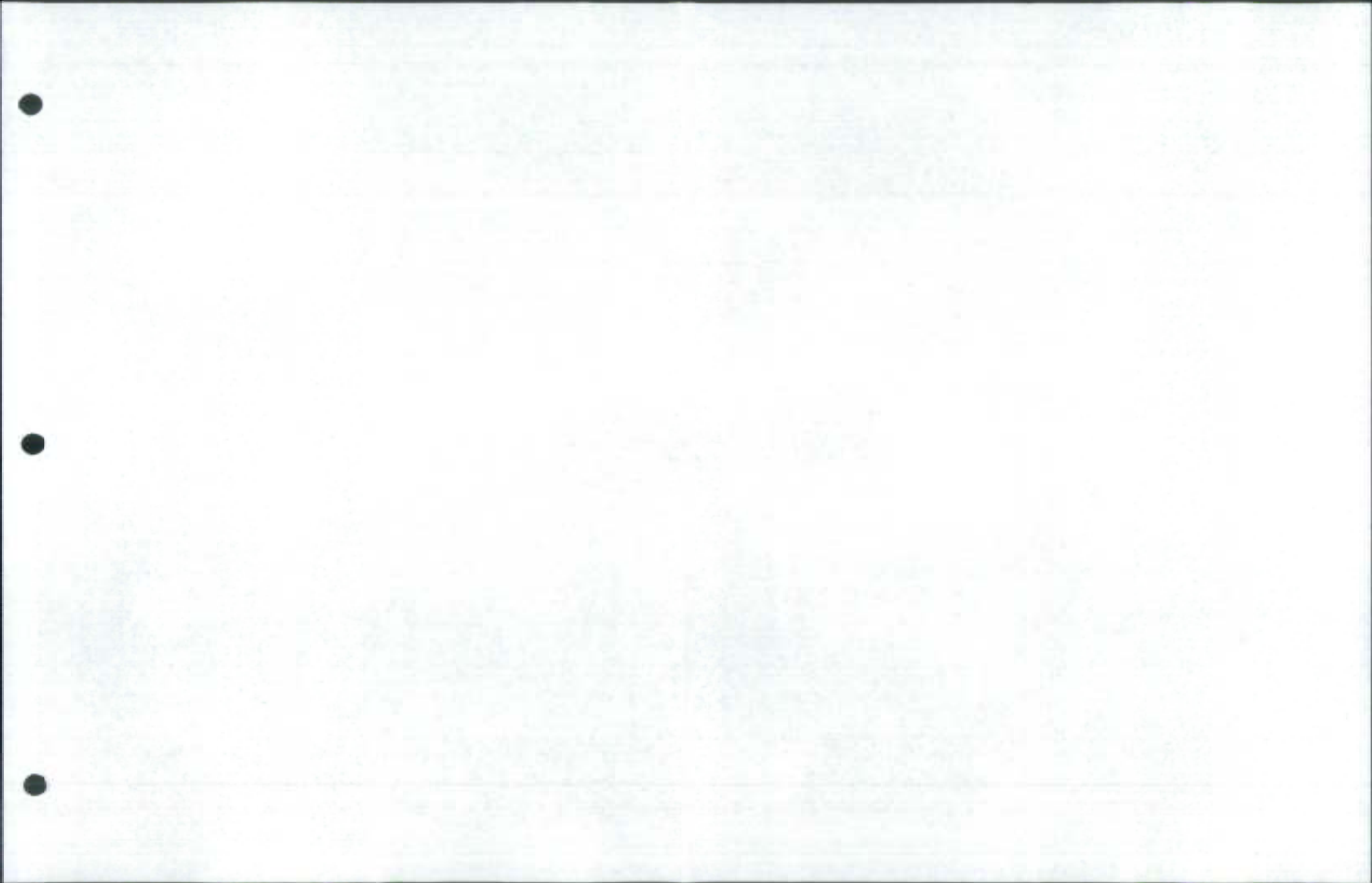
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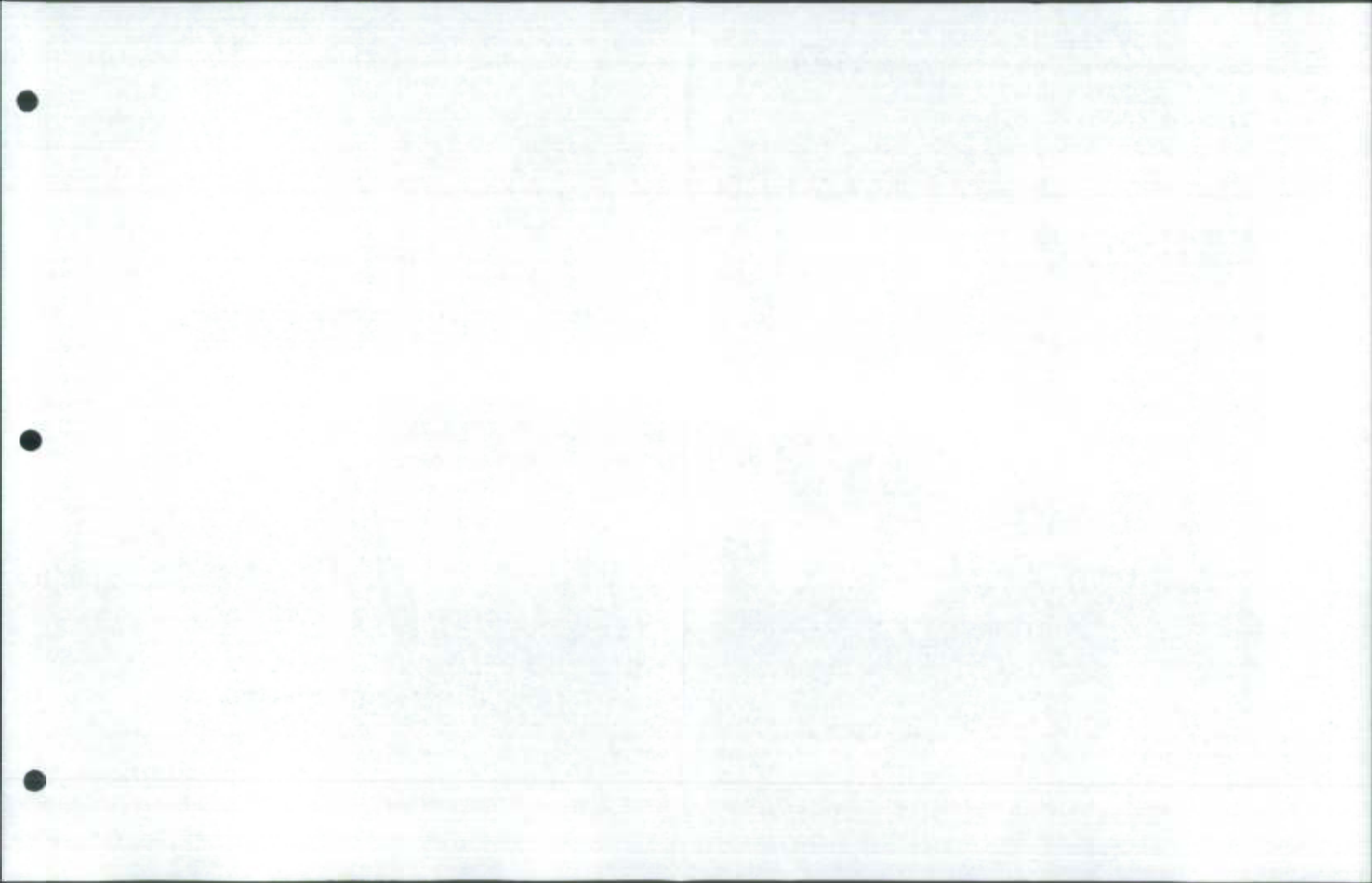
Legend

- Property (Structure) Name
- Ad. Large Adult Male
- Sub. Large Subadult Male
- Sub. Small Subadult Male, Pup.
- Ad. Large Ad.
- Unknown Ad.
- Immature Sub. Small
- Unknown, Unknown
- Immature, Unknown, Unknown
- Ad. Not Specified
- Unknown, unidentified, possibly Ad. Pup. or Non-Immature (Pup. or Ad.)
- Unknown, unidentified, possibly Ad. Pup. or Immature (Pup. or Ad.)
- Unknown, unidentified, possibly Ad. Pup. or Immature (Pup. or Ad.)









KERAMIDA Environmental, Inc.

LOG OF BORING KB-52

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/10/04
Drilling Method : Geoprobe
Geologist : Jason Condry
Drilling Co. : KEI

General Location : 25' NW of MW-153

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0		Brown TOPSOIL w/pea gravel (10YR 4/3)	1	3.0	0.0		
2					0.0		
4		pea gravel to sand to Silty Clay LOAM (10YR 4/1)	2	4.0	0.0		
6					0.0		
8		Clay LOAM w/ small pebbles (10YR 4/1)	3	2.0	0.0		
10					0.0		
12					0.0		
14		SAND w/small pebbles	4	3.4			
16		Fine SAND, wet			0.0		Groundwater sample collected for analysis (12'-16')
18							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-53

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, IndianaProject ID : 2829E
Date Drilled : 8/11/04
Drilling Method : Geoprobe

General Location : 80 NW of MMW-153

KERAMIDA Project No. 2829E

Geologist : Jason Condry
Drilling Co. : KEI

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0		Silty Clay LOAM/T opsoil (10YR 4/3)	1	3.6	0.0		
2		(10YR 4/2) (10YR 4/3)			0.0		
4			2	4.0	0.0		
6		Clay LOAM (10YR 4/2)			0.0		
8		1" gravel seam			0.0		
10		Silty CLAY, grey (10YR 3/1)	3	4.0	0.0		
12		SAND AND GRAVEL			0.0		
14			4	4.0	0.0		
16		wet			0.0		Groundwater sample collected for analysis (12-16)
18							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-54

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/10/04
Drilling Method : Geoprobe
Geologist : Jason Condry
Drilling Co. : KEIGeneral Location : 10' N of SWNNW
: system trailer

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
---------------------	---------	-------------	---------	-------------	------------	--------------	---------

0	T	TOPSOIL/gravel mix (10YR 4/3)	1	3.2	0.0		
2	T				0.0		
4	T	SAND			0.0		
6	T	Silty LOAM (10YR 4/3)	2	3.8	0.0		
8	T	(10YR 3/2)			0.0		
10	T	Fine SAND w/a little gravel			0.0		
12	T	SAND AND CLAY mix (10YR 3/1)	3	4.0	0.0		
14	T	Clay LOAM w/sand and gravel			0.0		
16	T	w/sand (10YR 4/3)			0.0		
18	T	Fine SAND (10YR 3/1)	4	4.0	0.0		
20	T	SAND AND GRAVEL, wet			0.0		Groundwater sample collected for analysis (12'-16')

KERAMIDA Environmental, Inc.

LOG OF BORING KB-55

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, IndianaProject ID : 2829E
Date Drilled : 8/11/04
Drilling Method : Geoprobe
Geologist : Jason Condry

General Location : 2' S of SVE 31 s/d

KERAMIDA Project No. 2829E

Drilling Co. : KEI

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0		Silty Clay LOAM Topsoil (10YR 4/3)	1	3.4	0.0		
2		0.5' sand mix seam (10YR 4/3)			0.0		
4		1' sand and gravel seam (10YR 3/1)	2	3.4	34.5		Soil sample collected for analysis (6)
6					236.7		
8		CLAY, stiff (10YR 3/1)			742.5		
10			3	3.2	498.7		
12		SAND mix (10YR 3/1)					
14		Silty Clay LOAM (10YR 4/3)					
16		Silty CLAY (10YR 3/1)			296.3		
18		SAND AND GRAVEL	4	3.6			
20		wet			46.2		Groundwater sample collected for analysis (12-16)

KERAMIDA Environmental, Inc.

LOG OF BORING KB-55a

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEI

General Location : 0.5' south of KB-55

Depth in feet	GRAPHIC	DESCRIPTION	Samples		FID ppm	Water Levels	REMARKS
			Rec Feet				
0		Blind Drilled (0-8')		1	NA		Soil sample collected for lab analysis (8-10')
				2	NA		
				3	989.1		
8		SAND (fine), very gravelly (fine), moist, loose, yellowish brown (10 YR 5/6), w/ silt loam, moist, firm, dark gray (2.5 Y 4/0)					
		SILT LOAM, slightly gravelly (fine), moist, firm, dark gray (2.5 Y 4/0), solvent odor present					
16							
12							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-56

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/10/04
Drilling Method : Geoprobe
Geologist : Jason Condy
Drilling Co. : KEI

General Location : 15' E, 8' S of SVE 31 s/d

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0		TOPSOIL w/clay tile debris (10YR 4/3)	1	3.2	0.0		
2					0.0		
4					0.0		
6		SAND AND GRAVEL mix	2	3.6	0.0		
8		SAND					
10		CLAY, grey (10YR 3/1-3/2)	3	4.0	6.8		
12		SAND AND GRAVEL			240.6		
14		SAND AND GRAVEL	4	4.0			
16		wet			55.6		
18							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-57

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/10/04
Drilling Method : Geoprobe
Geologist : Jason Condry
Drilling Co. : KEI

General Location : 2' W of SVE 32 s/d

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0	1	TOPSOIL, brown (10YR 4/3)	1	4.0	0.0		
1	2		2	3.4	11.6		Soil sample collected for analysis (6)
2	3		3	4.0	63.5		
3	4		4	3.0	400-500	▼	
4	5						
5	6						
6	7						
7	8						
8	9						
9	10						
10	11						
11	12						
12	13						
13	14						
14	15						
15	16						
16	17						
17	18						
18	19						
19	20						
20	21						

KERAMIDA Environmental, Inc.

LOG OF BORING KB-57a

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEI

General Location : 0.5 west of KB-57

Depth in feet	GRAPHIC	DESCRIPTION	Samples		PID ppm	Water Levels	REMARKS
			Rec Feet				
0		Blind Drilled (0-10')					
			1	NA	NA		Soil sample collected for lab analysis (10-12)
			2	NA	NA		
			3	NA	NA		
			4	2	641		
12		SILT LOAM, slightly gravelly (fine), moist to wet (non-saturated), dark gray (2.5 Y4/0)					
		SAND, slightly gravelly (fine), wet, olive gray (5 Y 4/2), black staining and solvent odor present					
		SAND (fine), extremely gravelly (fine), moist, loose, olive gray (5 Y 4/2)					
16							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-58

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/10/04
Drilling Method : Geoprobe
Geologist : Jason Condry
Drilling Co. : KEI

General Location : 2' N of SVE 28 s/d

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0		TOPSOIL (10YR 4/3)			0.0		
1			1	3.2	0.0		
2		Silty Clay LOAM w/gravel					
3							
4		SAND AND GRAVEL (10YR 4/3)			18.3		
5							
6		Silty CLAY	2	3.2	69.9		
7							
8		SAND AND GRAVEL					
9							
10		Clay LOAM, grey (10YR 3/1-3/2)	3	3.0	148.0		
11							
12		SAND AND GRAVEL			210.0		
13							
14		Clay LOAM (10YR 3/1) as above, w/sand, wet	4	4.0	22.5		
15							
16							
17							
18							
19							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-59

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/10/04
Drilling Method : Geoprobe
Geologist : Jason Condry
Drilling Co. : KEI

General Location : 15° E, 8° N of SYE 29 s/d

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	FID ppm	Water Levels	REMARKS
0		TOPSOIL w/gravel (10YR 4/3)					
1		as above (10YR 5/2)	1	3.8	0.0		
2		as above w/clay tile debris (10YR 3/3)			0.0		
3		as above w/gravel (10YR 5/2)					
4		Silty Clay LOAM (10YR 4/3)			0.0		
5		CLAY, stiff (10YR 3/2)	2	4.0	0.0		
6		sand at 8'					
7		LOAM w/sand and gravel (10YR 5/2)			141.3		
8		Fine SAND	3	4.0	420.1		
9		SAND AND GRAVEL			329.7		
10		Clay LOAM w/fine sand (10YR 5/2)	4	4.0	57.0		
11		wet					
12							
13							
14							
15							
16							
17							
18							
19							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-60

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, IndianaProject ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEI

General Location : 70' W & 30' S from the

: SW corner of Site
: building

KERAMIDA Project No. 2829E

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	PID ppm	Water Levels	REMARKS
0		Asphalt (0-0.3'), gravel (0.3-0.5')					
		Silt loam FILL, slightly gravelly, moist, dark yellowish brown (10 YR 3/6)	1	2	2.6		
					NA		
			2	3.4	1.7		
8		SILT LOAM, slightly gravelly (fine), moist, firm, grayish brown (2.5 Y 5/2)			5.7		Soil sample collected for lab analysis (8-10')
		SAND (fine), very gravelly (fine), wet (non-saturated), loose, dark gray (5 Y 4/1)	3	3.2	24.1		
					35.3		
		SILT LOAM, very gravelly (fine), wet (saturated), firm, dark gray (5 Y 4/1)					Groundwater sample collected for lab analysis (screen set at 7-12 bgs)
		SAND (fine), gravelly (fine), wet (non-saturated), loose, dark gray (5 Y 4/1)					
12							
16							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-61

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEIGeneral Location : 90' W & 30'S from the
: SW corner of Site
: building

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	PID ppm	Water Levels	REMARKS
0							
0.5		SILT LOAM, slightly gravelly (fine), moist, friable, dark grayish brown (10 YR 4/2)					
1		Black staining and slight solvent odor present Very dark grayish brown (10 YR 3/2)	1	3.5	4.6		
2		SANDY LOAM, very gravelly (fine), moist, loose, light olive brown (2.5 Y 5/3)			16.8		
4		SILT LOAM, gravelly (fine to medium), moist to wet (non-saturated), friable, yellowish brown (10 YR 5/4)	2	2.1	22.8		Soil sample collected for lab analysis (5-10')
8		Very gravelly (fine)			NA		
10		SANDY LOAM, slightly gravelly (fine), moist, firm, dark gray (2.5 Y 4/0)	3	2.9	25.6		
12		SAND, very gravelly (fine), wet (non-saturated), loose, dark gray (2.5 Y 4/0)			78.7		Groundwater sample collected for lab analysis (screen set at 10-15 bgs)
16		Wet (non-saturated to saturated)	4	2.0	137.2		
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-62

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEIGeneral Location : 130' W & 70'S from the
SW corner of Site
building

06-15-2005 J:\CLIENT-1\GIGENUIN-1\2829EG-1.THR\FIGURE-1\SOILBO-1\SOILBO-1\KB-62.BOR

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	PID ppm	Water Levels	REMARKS
0		SILT LOAM, slightly gravelly (fine), moist, loose, yellowish brown (10 YR 5/4)	1	3.8	0.4		Soil sample collected for lab analysis (4-6')
4		SAND (fine), gravelly (fine), moist, loose, brown (10 YR 5/3)	2	2.5	1.5		Soil sample collected for lab analysis (8-10')
8		SILT LOAM w/ sand (fine), moist, friable, dark grayish brown (10 YR 4/2), few, fine, faint iron concretions Slightly gravelly (fine to medium), dark gray (5 Y 4/1)	3	2.3	NA		Groundwater sample collected for lab analysis (screen set at 10-15 bgs)
12		SAND, extremely gravelly (fine), wet (saturated), loose, dark gray (5 Y 4/1)	4	3.3	127.4		
16					135.5		
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-63

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Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEIGeneral Location : 125' W & 30' N from the
: SW corner of Site
: building

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec Feet	PID ppm	Water Levels	REMARKS
0		TOP SOIL					
0		SILT LOAM, gravelly (fine) dry, friable, dark grayish brown (10 YR 4/2)	1	3.8	0.2		
		Moist, firm, brown to dark brown (10 YR 4/3)			0.0		
4		Gravelly (fine to medium)			1.5		
8		SILT LOAM, slightly gravelly (fine), wet (non-saturated), firm, dark gray (2.5 Y 4/0)	2	1.0	NA		Soil sample collected for lab analysis (8-10')
		Very gravelly (fine to medium)	3	3.2	69		Soil sample collected for lab analysis (10-11.2')
12		Wet (non-saturated)			95.6		
					97.8		Groundwater sample collected for lab analysis (screen set at 10-15' bgs)
16		SAND (fine), very gravelly (fine), wet (non-saturated to saturated), loose, dark grayish brown (2.5 Y 4/2)	4	3.8	62.7		
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-64

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEIGeneral Location : 99' W & 34' N from the
: SW corner of Site
: building

Depth in feet	GRAPHIC	DESCRIPTION	Samples		PID ppm	Water Levels		REMARKS
			Rec Feet					
0		Asphalt (0-0.3'), gravel (0.3-0.5')						
		SILT LOAM, slightly gravelly (fine), moist, firm, dark grayish brown (10 YR 4/2)	1	2.8	0.0			Soil sample collected for lab analysis (4-6')
		Rock (4.5-4.6') Slight solvent odor present	2	1.8	352			Soil sample collected for lab analysis (8-10')
		Dark gray (2.5 Y 4/0)			NA			Soil sample collected for lab analysis (10-10.6')
		SILT LOAM, gravelly (medium to coarse), moist, firm, dark gray (2.5 Y 4/0)	3	2.6	100.8			Soil sample collected for lab analysis (10-10.6')
		Wet (non-saturated)						Groundwater sample collected for lab analysis (screen set at 9.5-14.5' bgs)
		SAND (fine), very gravelly (fine), wet (saturated), loose, dark grayish brown (2.5 Y 4/2)	4	2.4	69.2			
20					69			

KERAMIDA Environmental, Inc.

LOG OF BORING KB-65

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Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/14/04
Drilling Method : Geoprobe
Geologist : SRC
Drilling Co. : KEIGeneral Location : 140' W & 25' S from the
: SW corner of Site
: building

Depth in feet	GRAPHIC	DESCRIPTION	Samples		Water Levels		REMARKS
			Rec Feet	PID ppm			
0		TOP SOIL, slightly gravelly (fine to medium), moist, loose, brown (10 YR 5/3)					
1		Sand & rock present SILT LOAM, slightly gravelly (fine), moist, firm, brown (10 YR 5/3) Grayish brown (2.5 Y 5/2) SILT LOAM, slightly gravelly (fine), moist, friable, dark gray (2.5 Y 4/0) Moist to wet (non-saturated) SAND (fine), gravelly (fine to medium), wet (saturated), loose, dark gray (2.5 Y 4/0)	1	3.5	5.2		
2			2	2.5	1.0		Soil sample collected for lab analysis (8-10)
3			3	3.0	31.7		Soil sample collected for lab analysis (10-11)
4			4	2.8	9.6		Groundwater sample collected for lab analysis (screen set at 9'-14' bgs)
5					73.6		
6							
7							
8							
9							
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-66











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Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project #2829E

Project ID : 2829E
Date Drilled : 3/27/05
Drilling Method : Push-probe
Geologist : Rob Hoverman
Drilling Co : KEI

General Location : Northeast of MW-10-1R

Depth in feet	GRAPHIC	DESCRIPTION	Rec Feet	PID ppm	REMARKS
0		SANDY CLAY LOAM, moist, friable, very dark grayish brown (10 YR 3/2)		0	
3.5		SANDY CLAY, slightly gravelly (fine), moist, friable, yellowish brown (10 YR 5/6)	3.5	0.6	
5		LOAM, moist, friable, yellowish brown (10 YR 5/4)		1.8	
3		SAND (medium), slightly gravelly (fine), moist, loose, some banding of varying colors	3	0.2	
3.5		SAND (fine to medium), moist, loose, light olive brown (2.5 Y 5/3)	3.5	2.2	
10		SAND (fine), slightly gravelly (fine), wet, light olive brown (2.5 Y 5/3)		1.0	Groundwater sample collected for possible lab analysis (12-16)
15		SILT LOAM, wet	3	8.0	
20		SAND (medium), slightly gravelly (fine), wet decreasing down to moist, light olive brown (2.5 Y 5/3)	4	11.7	Groundwater sample collected for possible lab analysis (16-20)
25		SAND (coarse), gravelly (fine), wet	3	4.7	Groundwater sample collected for possible lab analysis (20-24)
30		SAND (medium), wet	3	1.0	Groundwater sample collected for possible lab analysis (24-28)
35			2	2.2	Groundwater sample collected for possible lab analysis (24-28)
40				0.0	
				0.0	
				NA	

KERAMIDA Environmental, Inc.

LOG OF BORING KB-67

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Genuine Parts Company
700 North Olin Avenue
Indianapolis, IndianaProject ID : 2829E
Date Drilled : 3/27/05
Drilling Method : Push-probe
Geologist : Rob Hoveman
Drilling Co : KEI

General Location : Northwest of MMV-10-1R

Depth in feet	GRAPHIC	DESCRIPTION	Rec Feet	PID ppm	REMARKS
0		SANDY CLAY, moist, friable, dark yellowish brown (10 YR 4/4)	3.75	0.0	
		SANDY CLAY LOAM, moist, friable, olive brown (2.5 Y 4/3)	0.0	0.0	
5		SAND (medium), slightly gravelly (fine to coarse), dry	2	0.6	
			0.2		
10			3	0.0	
			0.6		
15		SANDY LOAM, moist, friable, olive brown (2.5 Y 4/4)			
		SILT LOAM, wet, friable, olive brown (2.5 Y 4/4)		15.3	
		LOAMY SAND, wet, friable, olive brown (2.5 Y 4/4)	3		
		SAND (medium), wet, loose, dark gray (2.5 Y 4/1)		24.6	
					Groundwater sample collected for possible lab analysis (12-16) Soil sample collected for possible lab analysis (14-16)

KERAMIDA Environmental, Inc.

LOG OF BORING KB-68

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Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project #2829E

Project ID : 2829E
Date Drilled : 3/27/05
Drilling Method : Push-probe
Geologist : Rob Hoverman
Drilling Co : KEI

General Location : South of Site trailer

Depth in feet	GRAPHIC	DESCRIPTION	Rec Feet	PID ppm	REMARKS
0	~	CLAY LOAM, moist, friable, dark yellowish brown (10 YR 3/4)	4	0.6	
	~	SANDY CLAY LOAM, slightly gravelly (fine), moist, friable, dark yellowish brown (10 YR 3/6)	4	1.8	
	~	SANDY LOAM, moist, friable, brown (10 YR 4/3)	1	0.6	
	~	SAND (medium to coarse), slightly gravelly (fine), moist, loose	1	NA	
	~	As above, wet at 10.5'	2.5	0.2	
	~		3	0.2	Groundwater sample collected for possible lab analysis (12-16)
15					
20					
25					
30					
35					
40					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-69

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Genuine Parts Company 700 North Olin Avenue Indianapolis, Indiana		Project ID : 2829E Date Drilled : 3/28/05 Drilling Method : Push-probe Geologist : Rob Hoverman Drilling Co : KEI		General Location : East of Site trailer and : south of pavement edge	
KERAMIDA Project #2829E					
Depth in feet	GRAPHIC	DESCRIPTION	Rec Feet	PID ppm	REMARKS
0		SANDY LOAM, slightly gravelly (fine), moist, friable, very dark yellowish brown (10 YR 3/4)		0.0	
		CLAY LOAM, moist, friable, dark olive brown (2.5 Y 3/3)	3	0.0	
		LOAMY SAND, slightly gravelly (fine), moist, friable, dark yellowish brown (10 YR 4/4)		0.0	
5		SAND (medium), moist, loose, yellowish brown (10 YR 5/4)	1	NA	
				1.4	
10		SILT, moist, friable, light olive brown (2.5 Y 5/4)	3	1.0	
		SAND (fine), moist, loose, light olive brown (2.5 Y 5/4)		2.6	Groundwater sample collected for possible lab analysis (12-16)
		SAND (fine to medium), wet, loose, brown (10 YR 5/3)	4	2.2	
15				2.6	Groundwater sample collected for possible lab analysis (16-20)
20		SAND (medium to coarse), slightly gravelly (fine to medium), wet, loose	2.5	1.0	
				0.6	Groundwater sample collected for possible lab analysis (20-24)
25		SAND (medium to coarse), slightly gravelly (fine to medium), wet, loose	3	1.0	
				0.6	Groundwater sample collected for possible lab analysis (24-28)
30			3	0.0	Groundwater sample collected for possible lab analysis (28-32)
				0.0	
35			3	3.5	
				6.0	Groundwater sample collected for possible lab analysis (32-36)
40					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-70

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Genuine Parts Company 700 North Olin Avenue Indianapolis, Indiana		Project ID Date Drilled Drilling Method Geologist Drilling Co	: 2829E : 3/28/05 : Push-probe : Rob Hoverman : KEI	General Location : 20' south of KB-68
KERAMIDA Project #2829E				
Depth in feet	DESCRIPTION	Rec Feet	PID ppm	REMARKS
0	CLAY LOAM, moist, friable, dark grayish brown (10 YR 4/2)	3	0.0	
		3	0.0	
5	SAND (medium), slightly gravelly (fine), moist, loose, pale brown (10 YR 6/3)	2.75	0.2	
	SAND (medium), moist increasing down		0.2	Soil sample collected for possible lab analysis (8.75-10)
10	Black staining at 10'	3	0.6	Groundwater sample collected for possible lab analysis (8-12)
	SAND (fine to medium), gravelly (fine to medium), wet, loose		0.2	
15		3.5	2.2	Groundwater sample collected for possible lab analysis (12-16)
20				
25				
30				
35				
40				

KERAMIDA Environmental, Inc.

LOG OF BORING KB-71

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Genuine Parts Company
700 North Olin Avenue
Indianapolis, Marion County, Indiana

KERAMIDA Project No. 2829E-001

Project ID : 2829E-001
Date Drilled : 10-03-05
Drilling Method : Push-Probe
Geologist/Tech : Ryan Moore
Drilling Co : KEI

General Location : Adjacent to SVE 32

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec %	FID ppm	REMARKS
0		Silt Loam, slightly gravelly (medium), friable, dry, 2.5Y 3/2 (very dark grayish brown)	1	80	0	
4		Sandy Loam, slightly gravelly (medium), friable, dry, 2.5Y 4/3 (olive brown)				
		Sand (medium to coarse), (fine), (medium), loose, moist, 2.5Y 3/2 (very dark grayish brown)	2	80	39.2	
8		Sandy Loam, gravelly (medium), friable, moist, 5Y 4/2 (olive gray), solvent like odor			359.1	Soil sample collected for lab analysis (8-10).
		Same as above, wet (non-saturated),	3	100	659.1	Soil sample collected for lab analysis (10-12).
12		Sand (medium to coarse), (fine), (medium), loose, wet (saturated), 5Y 4/1 (dark gray)				
16						
20						

KERAMIDA Environmental, Inc.

LOG OF BORING KB-72

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Marion County, Indiana

Project ID : 2829E-001
Date Drilled : 10-03-05
Drilling Method : Push-Probe
Geologist/Tech : Ryan Moore
Drilling Co : KEI

General Location : Adjacent to SVE 28

KERAMIDA Project No. 2829E-001

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec %	FID ppm	REMARKS
0		Silt Loam, friable, moist, 10YR 3/2 (very dark grayish brown) Same as above, slightly gravelly (medium), friable, brick fragments	1	80	0	
4		Loamy Sand (medium), loose, moist, 2.5Y 4/4 (olive brown)			0	
8		Sandy Loam, friable, moist, 2.5Y 3/2 (very dark grayish brown) Same as above, gravelly (medium), friable, moist, 5Y 4/1 (dark gray), solvent like odor	2	100	249.1	Soil sample collected for lab analysis (C-7).
12		Sand (medium to coarse), (fine), (medium), loose, wet (non-saturated), 2.5Y 4/4 (olive brown)	3	100	194.3	
16		Same as above, wet (saturated)			707.1	
20						

KERAMIDA Environmental, Inc.

LOG OF BORING KB-73

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Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 6/28/06
Drilling Method : Geoprobe
Geologist : RSF
Drilling Co. : KEI

General Location : 25' SW of KB-62

Depth in feet	GRAPHIC	DESCRIPTION	Samples		FID ppm	Water Levels		REMARKS
			Rec %					
0		Topsoil			0			
1			1	50	0			
2		No recovery						
3								
4		Coarse sand with gravel, tan, dry, loose			0			
5								
6								
7								
8		Silt loam with sand, dry to moist, soft to medium, dark gray	2	75	1.5			
9								
10		Sand fine to medium with gravel, loose, moist, dark gray			0			
11								
12		Wet	3	100	1.5			Soil sample collected for lab analysis (6-107)
13								
14								
15								
16								
17								
18								
19								
20								

KERAMIDA Environmental, Inc.

LOG OF BORING KB-74

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 6/28/08
Drilling Method : Geoprobe
Geologist : RSF
Drilling Co. : KEI

General Location : 25' S of KB-62

Depth in feet	GRAPHIC	DESCRIPTION	Samples		Water Levels	REMARKS
			Rec %	FID ppm		
0		Topsoil				
1			1	100	0	
2						
3		Silt Loam, dry, loose, tan/brown				
4		Fine to medium sand, brown, loose, dry				
5						
6						
7						
8		With gravel				
9						
10						
11		Silt Loam with sand, moist, stiff, slight red staining, dark gray and tan	2	100	1.2	Soil sample collected for lab analysis (6-8)
12		No staining			8.2	
13		wet	3	75	0	
14						
15		Fine to medium sand with gravel, wet, dark gray, loose			0.5	
16						
17						
18						
19						
20						

KERAMIDA Environmental, Inc.

LOG OF BORING KB-75

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 6/28/08
Drilling Method : Geoprobe
Geologist : RSF
Drilling Co. : KEI

General Location : 25 SSE of KB-62

Depth in feet	GRAPHIC	DESCRIPTION	Samples		FID ppm	Water Levels	REMARKS
				Rec %			
0		Topsoil			0		Soil sample collected for lab analysis (8-10)
1		Silt Loam with sand, medium stiff, dry, brown	1	100	0		
4		With gravel			0		
8		Moist Silt loam with sand, medium stiff, tan, dry Stiff, dark gray	2	75	14.9		
12		with gravel, wet, loose	3	100	14.5		
16		Medium sand at tip					
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-76

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, IndianaProject ID : 2829E
Date Drilled : 6/28/06
Drilling Method : Geoprobe

General Location : 18' E of KB-62

KERAMIDA Project No. 2829E

Geologist : RSF
Drilling Co. : KEI

Depth in feet	GRAPHIC	DESCRIPTION	Samples	Rec %	FID ppm	Water Levels	REMARKS
0		Topsoil with gravel fill material					
1		Silt loam with sand; dry, brown, soft, brick fragments (1-3)	1	100	0		
2		Dark gray, medium to stiff			0		
3		Brick fragments (4-5)			30		
4		Medium sand with gravel, tan, loose, dry	2	100	800		Soil sample collected for lab analysis (6-6)
5		Silt loam, dry, tan, medium stiff			490		
6		Dark gray			250		
7		Moist					
8		Very moist to wet	3	100			
9		Medium sand with gravel, wet, tan, loose					
10							
11							
12							
13							
14							
15							
16							
17							
18							
19							
20							

KERAMIDA Environmental, Inc.

LOG OF BORING KB-77

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 6/28/06
Drilling Method : Geoprobe
Geologist : RSF
Drilling Co. : KEI

General Location : 25' NE of KB-62

Depth in feet	GRAPHIC	DESCRIPTION	Samples		Water Levels	REMARKS
			Rec %	FID ppm		
0		Topsoil				
1		No recovery	1	25	20	
4		Silt loam with sand, medium stiff, tan, dry				
		Dark gray and tan, with gravel	2	100	30	Soil sample collected for lab analysis (6-8)
		Dark gray, with gravel			68	
		becoming moist			37	
8			3	100	39	Soil sample collected for lab analysis (10-12)
		Medium sand with gravel, tan, moist, loose				
		Silt loam with gravel, dark gray, very moist				
12		Medium to coarse sand, gray, loose, wet	4	100	35	
16					47	
20						

KERAMIDA Environmental, Inc.

LOG OF BORING KB-78

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, IndianaProject ID : 2829E
Date Drilled : 6/28/08
Drilling Method : Geoprobe
Geologist : RSF

General Location : 25' NW of KB-62

KERAMIDA Project No. 2829E

Drilling Co. : KEI

Depth in feet	GRAPHIC	DESCRIPTION	Samples		FID ppm	Water Levels	REMARKS
			Rec %				
0		Topsoil with gravel and wood					
1				1	100		Soil sample collected for lab analysis (2-4')
2		Medium sand with gravel, tan, loose, dry					
3		Silt loam with sand, dark gray and tan, dry, soft, some black staining (3-3.5')			760		
4		without staining			5.3		
5				2	100		Soil sample collected for lab analysis (10-11')
6							
7							
8		Medium to coarse sand with gravel, loose, brown, dry			3.0		
9							
10		Sandy silt loam, dry, stiff, gray					
11		Moist			23		
12				3	100		
13							
14							
15							
16							
17							
18							
19							
20		Fine to medium sand, loose, gray and tan, wet			226		

KERAMIDA Environmental, Inc.

LOG OF BORING KB-A

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 8/24/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : North of SVE-1 In
the southern portion of
the Holt Road entrance

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')			
			NA	NA	
5		SANDY LOAM, gravelly (fine to medium), moist, firm, dark gray (5 Y 4/1)	2.8	0.0	
				0.9	
		SAND (fine), moist, loose, dark gray (5 Y 4/1)			
		SANDY LOAM, gravelly (fine to medium), moist, firm, dark gray (5 Y 4/1), strong odor present		287	
10			3.4		
		SAND (fine), extremely gravelly (fine), moist, loose, very dark gray (5 Y 3/1)		8.4	
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-B

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 8/24/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Northwest of SVE-1 in
the southern portion of
the Holt Road entrance

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')			
			NA	NA	
5		SANDY LOAM, gravelly (fine to medium), moist, firm, dark gray (5 Y 4/1)	2.6	0.0	Collected a soil sample for laboratory analysis (6-8)
				18.6	
		Rock			
		SAND (fine), extremely gravelly (fine to medium), moist, loose, very dark gray (5 Y 3/1)	1.4	1.0	
10					
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-C

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

Project ID : 2829E-005
Date Drilled : 8/24/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 13' north of
soil boring KB-A

KERAMIDA Project No. 2829E-005

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')			
			NA	NA	
		SANDY LOAM, gravelly (fine to medium), moist, firm, dark gray (5 Y 4/1)	0.0		
			3.0	38	
		SAND w/ gravel			Collected a soil sample for laboratory analysis (8-10')
				43	
		SANDY LOAM, gravelly (fine to medium), moist, firm, dark gray (5 Y 4/1)	2.7		
		SAND (fine), extremely gravelly (fine to medium), moist, loose, yellowish brown (10 YR 5/4)		2.0	
10					
5					
0					
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-D

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 8/24/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 3' west of the
Hot Road entrance
south gate post

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')			
			NA	NA	
		SANDY LOAM, slightly gravelly (fine), moist, firm, olive gray (5 Y 4/2)	3.1	3.1	
5			2.5	5.8	
			3.1	0.0	
10		SAND (fine), moist, loose, brown	3.1	0.0	
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-E

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 8/25/2008
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 4' east & 9' north
: of the northwest corner of
: the west system trailer

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')			
			NA	NA	
		SAND (fine), moist, loose, brown (10 YR 5/3)		NA	
5		SANDY LOAM, gravelly (fine), firm, brown (10 YR 4/3)	3.8	10.0	
		Dark gray 92.5 Y 4/1)		8.6	
		Wet (saturated), gray (5 Y 5/1)		4.7	Collected a soil sample for laboratory analysis (8-10')
10			3.9	4.5	
		SAND (fine), moist, loose, gray (5 Y 4/1)			
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-F



(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

Project ID : 2829E-005
Date Drilled : 8/25/2006
Drilling Method : Push-probe
Geologists/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 9' west & 33' north
: of the northwest corner of
: the west system trailer

KERAMIDA Project No. 2829E-005

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')			
			NA	NA	
			NA	NA	
5		Sand & Gravel FILL			
			0.0		Collected a soil sample for laboratory analysis (5-6.5')
		SANDY LOAM, moist, firm, dark gray (5 Y 4/1)	2.4		
			10.8		
			3.2		Collected a soil sample for laboratory analysis (8-10')
10		SAND (fine), moist, loose, dark grayish brown	2.2		
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-G

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

Project ID : 2829E-005
Date Drilled : 8/25/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 23' west & 45' north
of the northwest corner of
the west system trailer

KERAMIDA Project No. 2829E-005

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')		NA	
			NA	NA	
5		Silt loam FILL, slightly gravelly (fine), moist, friable, dark grayish brown (10 YR 4/2)	3.8	6.0	Collected a soil sample for laboratory analysis (6-8')
		SANDY LOAM, moist, firm, dark gray (5 Y 4/1)		11.5	Collected a soil sample for laboratory analysis (6-8')
		Slightly gravelly (fine to medium)		8.7	Collected a soil sample for laboratory analysis (8-10')
10		Wet	3.8	7.5	
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-H


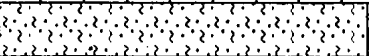
(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

Project ID : 2829E-005
Date Drilled : 8/25/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 15' east & 7'
: south of KB-64

KERAMIDA Project No. 2829E-005

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind Drilled (0-4')		NA	
			NA	NA	
5		Sand & Gravel FILL		0.0	
		SANDY LOAM, moist, frible to firm, dark grayish brown (2.5 Y 4/2)	2.9	15.3	
		SANDY LOAM, moist, firm, gray (5 Y 5/1)	2.0	16.8	Collected a soil sample for laboratory analysis (8-10)
10					
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-1

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 9/6/2008
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 137' west & 103'
: north of the southwest
: corner of Site bldg.

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0	Asphalt				
	Gravel FILL			0.0	
		SANDY LOAM, very gravelly (fine), moist, firm, very dark grayish brown (10 YR 3/2)	2.9	0.0	
		SANDY LOAM, slightly gravelly (fine), moist, friable, dark grayish brown (2.5 Y 4/2) to gray (5 Y 4/1)	3.2	0.0	
		SAND (fine), very gravelly (fine to medium), wet (saturated), olive (5 Y 4/3)	1.2	0.0	Collected a soil sample for laboratory analysis (8-10')
10					
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-J

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

Project ID : 2829E-005
Date Drilled : 9/6/2006
Drilling Method : Push-probe
Geologists/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 93' west & 103'
: north of the southwest
: corner of Site Bldg.

KERAMIDA Project No. 2829E-005

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind			
			NA	NA	
			2.3	0.0	
		Sandy loam FILL, gravelly (fine), moist, friable to firm, very dark grayish brown (10 YR 3/2)		0.0	
			2.7	0.0	
		SANDY LOAM, slightly gravelly (fine to medium), friable, gray (5 Y 5/1)		2.1	Collected a soil sample for laboratory analysis (10-12)
10					
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-K

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

Project ID : 2829E-005
Date Drilled : 9/6/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 73' west & 62'
: north of the southwest
: corner of Site bldg.

KERAMIDA Project No. 2829E-005

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind		NA	
			NA	NA	
		Silt loam FILL, gravelly (fine), moist, firm, dark grayish brown (10 YR 3/2)	3.3	0.0	
		Sand (fine) FILL, moist, loose, olive brown (2.5 Y 4/3)	3.3	0.2	Collected a soil sample for laboratory analysis (8-10')
		SANDY LOAM, slightly gravelly (fine to medium), moist, firm, gray (5 Y 5/1)	3.4	21.7	Collected a soil sample for laboratory analysis (10-12')
		Moist to very moist	3.4	18.4	
10					
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-L

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 9/6/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : Keramida

General Location : Approx. 66' west & 24'
: north of the southwest
: corner of Site bldg.

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind			
			NA	NA	
		Silt loam FILL, gravelly (fine), moist, firm, dark grayish brown (10 YR 4/2)		0.0	
5			3.5	17.3	Collected a soil sample for laboratory analysis (8-10)
		SAND (fine), moist, loose, olive (5 Y 4/3)		58.6	
		SANDY LOAM, gravelly (fine to medium), moist to very moist, friable, gray (5 Y 5/1)	2.7	30.7	Collected a soil sample for laboratory analysis (10-12)
10		SAND, gravelly (fine), moist, loose, brown			
15					

KERAMIDA Environmental, Inc.

LOG OF BORING KB-M

(Page 1 of 1)

Former General Motors Corporation
Allison Gas Turbine Division-Plant 10
700 North Olin Avenue
Indianapolis, Indiana

KERAMIDA Project No. 2829E-005

Project ID : 2829E-005
Date Drilled : 9/6/2006
Drilling Method : Push-probe
Geologist/Tech : Steve Cobb
Drilling Co. : KeramidaGeneral Location : Approx. 65' west & 1.5'
: north of the southwest
: corner of Site Bldg.

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS
0		Blind		NA	
			NA	NA	
		Gravel FILL			
5		Silt loam FILL, gravelly (fine), very dark gray (5 Y 3/1) w/ olive (5 Y 4/4)	2.2	0.0	
		SANDY LOAM, gravelly (fine to medium), moist, firm, gray (5 Y 5/1)		NA	
			1.4	5.1	Collected a soil sample for laboratory analysis (8-10)
10		SAND (fine), very gravelly (fine), moist, loose, dark olive gray (5 Y 4/2)			
15					

KERAMIDA Environmental, Inc.

LOG OF BORING MW-132R

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 10/10/2006
Drilling Method : HSA
Geologist/Tech : Steve Cobb
Drilling Co. : Earth Exploration

General Location : At former MW-132
location

Well: MW-132
Elev.: 711.74

Depth
in
feet

GRAPHIC

DESCRIPTION

feet

PID
ppm

REMARKS

Blind Drilled (0-19.5')

NA

NA

NA

NA

NA

NA

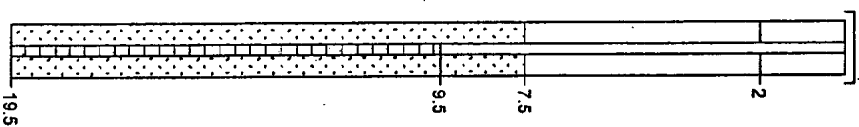
NA

NA

NA

NA

Well Construction:
Screen: 9.5-19.5'
Riser: 0-9.5'
Sand Pack: 18-30'
Bentonite: 2-7.5'
Concrete: 0-2'



LOG OF BORING MW-147AR

(Page 1 of 1)

General Location : At former MW-147A
: location

GRAPHIC

feet

PID
ppm

REMARKS

Well: MW-147AR
Elev.: 711.71

Blind Drilled (0-30')

NA

MA

NA

N/A

NA

3

Well Construction:
Screen: 20-30"
Riser: 0-20"
Sand Pack: 18-30"
Bentonite: 2-18"
Concrete: 0-2'

2

- 18

20

30

KERAMIDA Environmental, Inc.

LOG OF BORING MW-148R

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 10/10/2006
Drilling Method : HSA
Geologist/Tech : Steve Cobb
Drilling Co. : Earth Exploration

General Location : At former MW-148
location

Depth in feet	GRAPHIC	DESCRIPTION	feet	PID ppm	REMARKS	Well: MW-148 Elev.: 711.44
---------------------	---------	-------------	------	------------	---------	-------------------------------

0	Blind Drilled (0-25.5')			NA	NA	Well Construction: Screen: 10.5-25.5' Riser: 0-10.5' Sand Pack: 8-25.5' Bentonite: 2-8' Concrete: 0-2'
5				NA	NA	
10				NA	NA	
15				NA	NA	
20				NA	NA	
25				NA	NA	

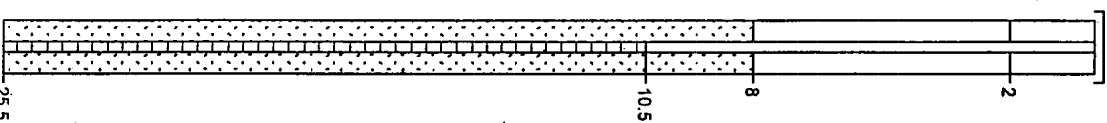




Photo 1. Area 3 Excavation - Facing South



Photo 2. Area 2 Excavation - Facing West



Photo 3. Area 1 Excavation

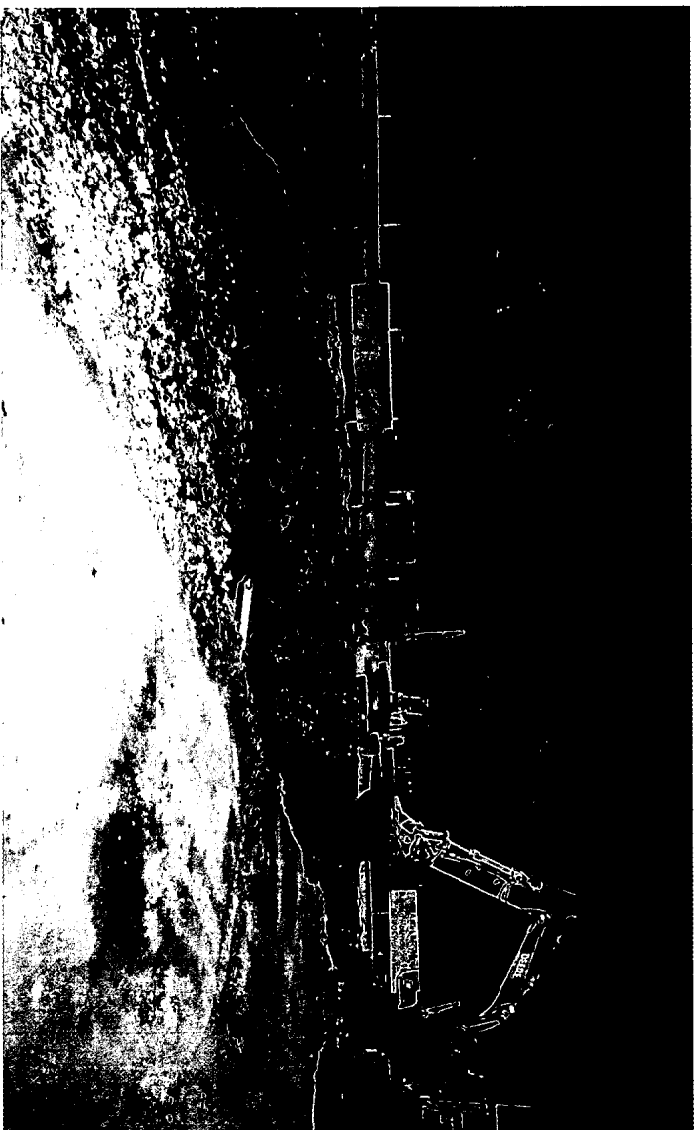


Photo 4. Area 1 Excavation - Facing North

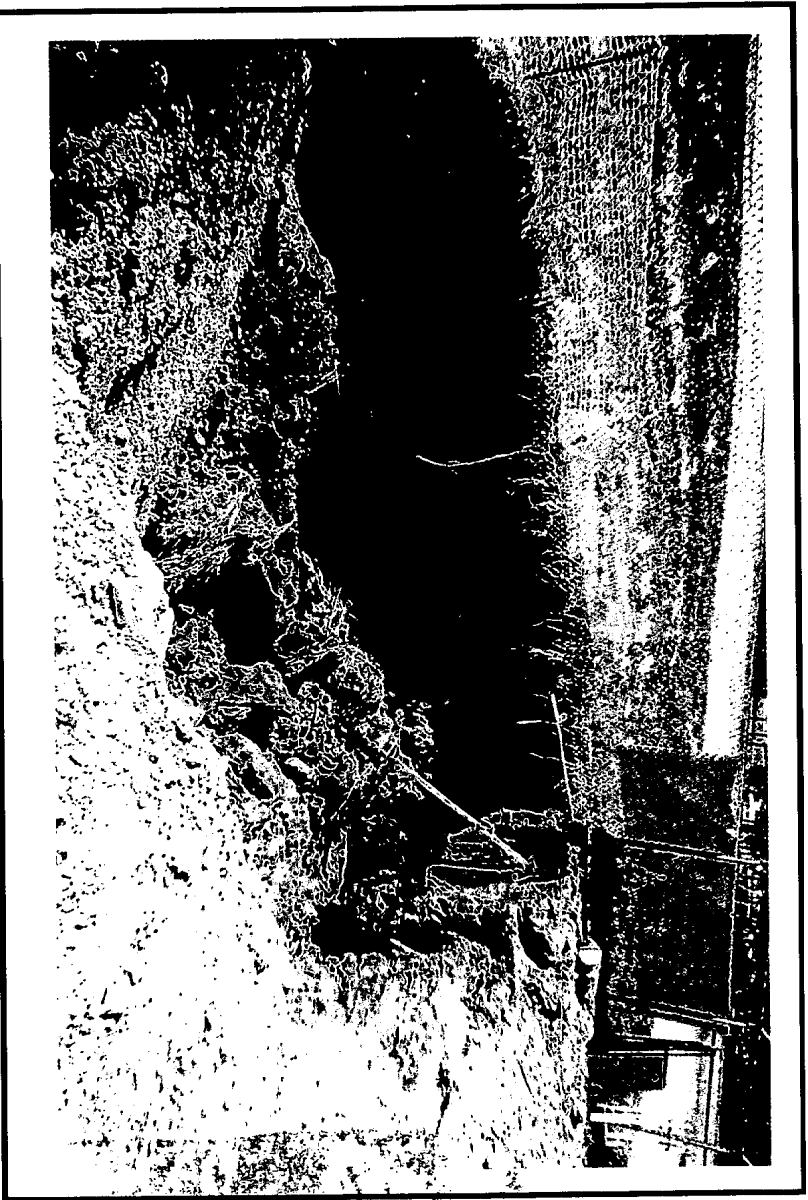


Photo 5. Area 2 Excavation - Facing North

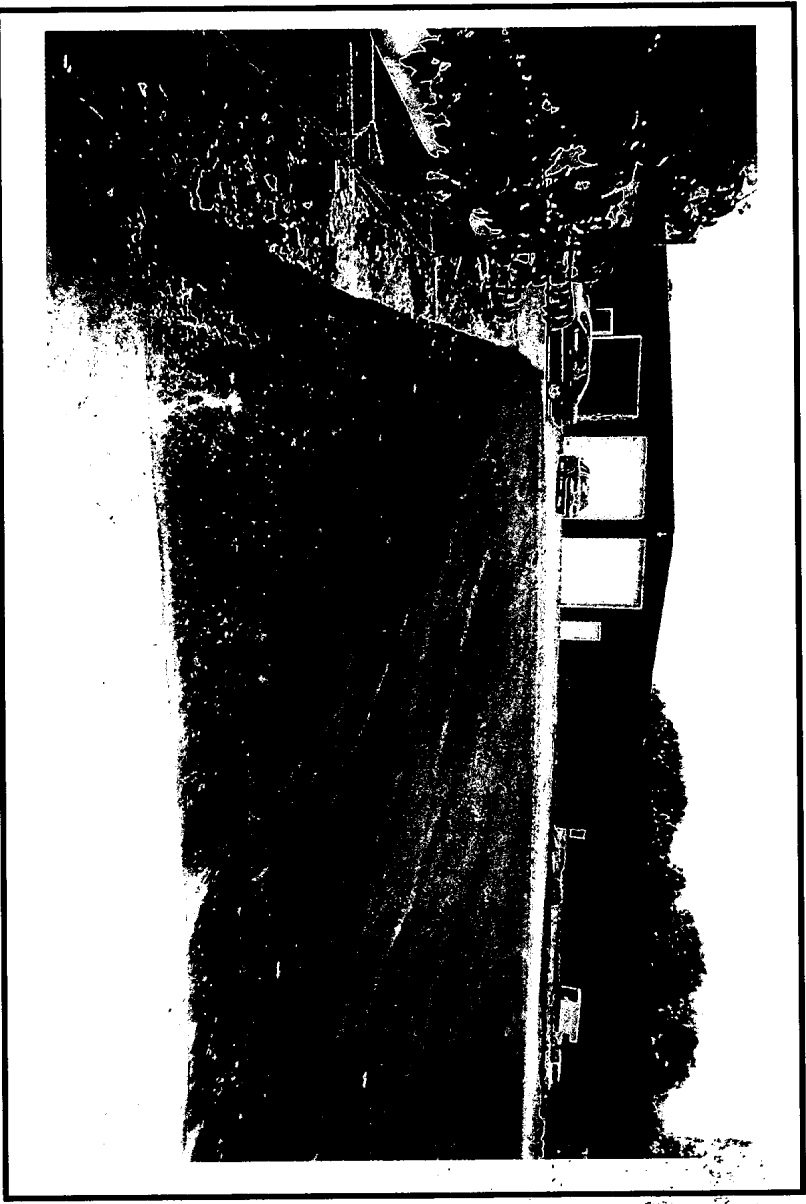


Photo 6. Final Asphalt Grade - Facing Southeast

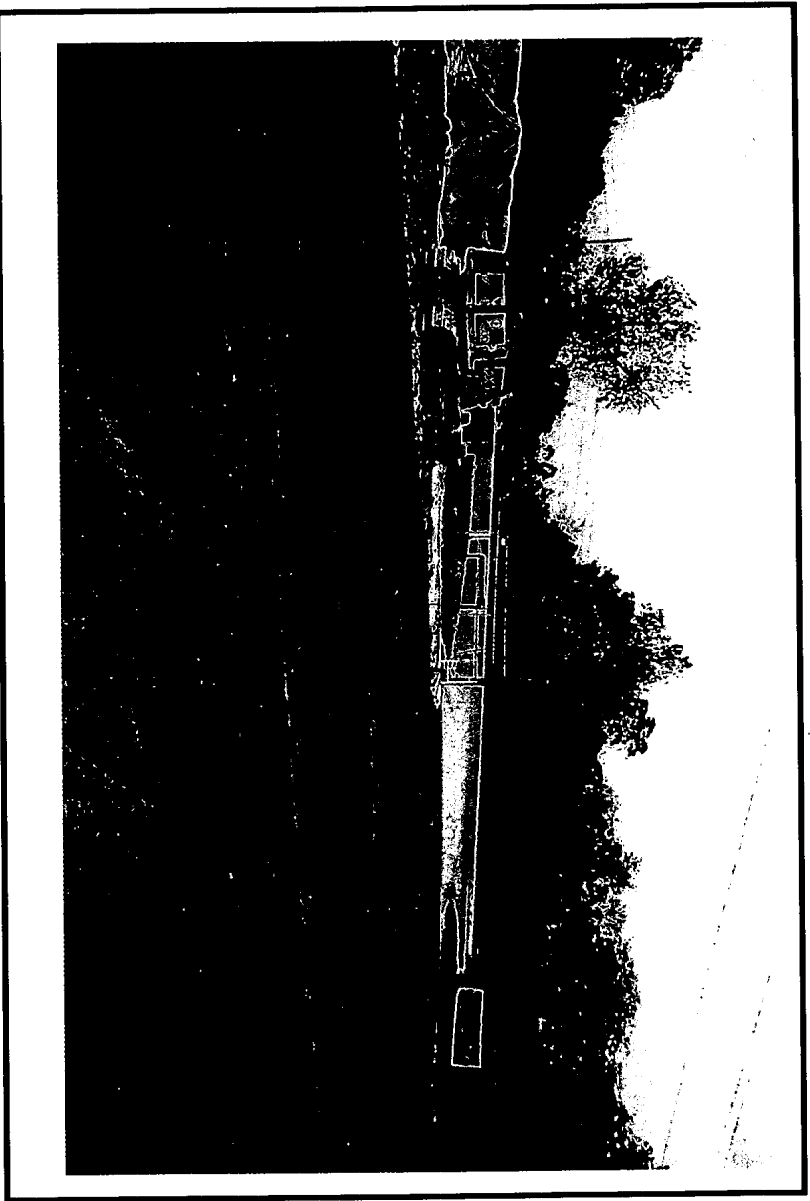


Photo 7. Final Asphalt Grade - Facing Northwest

1000

1000



TRANSMITTAL

Date: September 28, 2006

To: Indiana Department of Natural Resources
Division of Water
402 W. Washington St., Rm W264
Indianapolis, IN 46204

RECEIVED

SEP 29 2006

KERAMIDA



Project: Genuine Parts Company

Location: Indianapolis, Indiana

EEL Project No.: 1-06-292

Enclosed is 1 ☒ Copy ☐ Samples ☐

- ☒ Record of Water Well – Abandonment –
- ☐ Record of Water Well – Installation –
- ☐

The enclosed items are being sent via:


- ☒ First Class Mail
- ☐ Overnight Delivery by
- ☐ UPS
- ☐ Federal Express
- ☐ EEL Courier

Remarks:

c: KERAMIDA Environmental, Inc.

Sincerely,

EARTH EXPLORATION, INC.


Mark N. Knuttel
Project Coordinator

**RECORD OF WATER WELL**

State Form 55680 (R5/9-04)

Driller-Mail complete record in 30 days to:
INDIANA DEPT. OF NATURAL RESOURCES
Division of Water
402 W. Washington St., Rm. W264
Indianapolis, IN 46204-2641
(877) 928-3755 toll-free or (317) 232-4160County Permit
NumberDNR Variance
Number

Include if applicable

Fill in completely

WELL LOCATION		Range number (E-W)	Section
County where drilled Marion	Civil township name Wayne	T15N	R3E
Driving directions to the well location (include trip origin, street & road names, intersecting roads, and compass directions). Show well address below and subdivision in box at lower right. There is space for a map on the reverse side. See attached map		Well Abandonment (see attached table)	
Well address: 700 North Elm Avenue		Subdivision name & lot number (if applicable)	
If drilled for water supply, this well is: <input type="checkbox"/> First well on property <input type="checkbox"/> Replacement well <input type="checkbox"/> Additional well on property <input type="checkbox"/> Dry hole		UTM Northing	
		UTM Easting	
		Datum <input type="checkbox"/> NAD 27 <input type="checkbox"/> NAD 83	
		GPS used	
Well owner-name Genuine Parts Company		Telephone number —	
Address (number and street, city, state, ZIP code) 700 North Elm Avenue Indianapolis, IN			
Building contractor-name —	Address (number and street, city, state, ZIP code) —	Telephone number —	
Drilling contractor-name Earth Exploration, Inc.	Address (number and street, city, state, ZIP code) 1770 W. New York St. Indpls. IN 46214	Telephone number 317-293-1690	
Equipment operator-name Bertie Judy / Andrew Carpenter	License number of operator 1732/2011	Date of well completion See attached summary table	
CONSTRUCTION DETAILS			
Use of well	Drilling method	Type of pump	FORMATIONS: Type of material
<input checked="" type="checkbox"/> Home	<input type="checkbox"/> Rotary	<input type="checkbox"/> Submersible	From (feet) To (feet)
<input checked="" type="checkbox"/> Public supply	<input type="checkbox"/> Reverse rotary	<input type="checkbox"/> Shallow-well jet	
<input type="checkbox"/> Industrial / commercial	<input type="checkbox"/> Cable tool	<input type="checkbox"/> Deep-well jet	See attached borelog logs
<input type="checkbox"/> Livestock	<input type="checkbox"/> Jet	<input type="checkbox"/> No pump installed	
<input checked="" type="checkbox"/> Irrigation	<input type="checkbox"/> Bucket / bore	Other: —	For subsurface information
<input checked="" type="checkbox"/> Monitoring / environ.	<input checked="" type="checkbox"/> Auger (including HSA)		
<input type="checkbox"/> Test hole	<input type="checkbox"/> Direct push	Pump depth setting (feet)	
Other: —			
Total depth of well (feet) 12	Borehole diameter (in.) —	Gravel pack inserted 12	See attached Well Phen Summary
Casing length (feet) 12	Casing diameter (in.) 12	Casing material 12	Summary Table for well
		<input type="checkbox"/> PVC <input type="checkbox"/> Steel	Construction details
Screen length (feet) 12	Screen diameter (in.) 12	<input type="checkbox"/> PVC <input type="checkbox"/> Steel	
Screen slot size 1/8	Water quality (clear, odor, etc.) —		
WELL CAPACITY TEST			
Test method	Static level below surface	Gallons per min. tested	Hours (change in level)
<input type="checkbox"/> Air	—	—	—
<input type="checkbox"/> Bailing	—	—	—
<input type="checkbox"/> Pumping	—	—	—
WELL ABANDONMENT			
Grout material	Grout depth from to	Sealing material Bedbrite Concrete	Depth filled from to Full
Installation method	No. of bags used	Installation method Surface	No. of bags used —
Additional space for well log and comments on reverse side			
I hereby swear or affirm, under the penalties for perjury, that the information submitted herewith is, to the best of my knowledge and belief, true, accurate, and complete.			Date
Earth Exploration, Inc. M. J. K. J. J.			9.28.06

WELL OF LIFE DOES NOT FILL OUT THIS SECTION

County	Township	Range	Ground elevation	Reserve or grant name	1/4 of	1/4 of	Section	USGS topo map	Field location	Date	<ul style="list-style-type: none"> ○ GT Greenville Treaty area (1st Prin. Merid.) ○ MD Vincennes donations and grants ○ CMG Clark Military Grant (sections 1-298) ○ MRL Michigan Road Land (sections 1-45) ○ Reserve granted by treaty (name above) 	<ul style="list-style-type: none"> ○ F1 S of NL ○ F1 E of WL ○ F1 N of SL ○ F1 W of EL 	Bedrock elevation	Aquifer elevation	UTM coordinates accepted, verified, on NAD 27 or determined by Division of Water	UTM Northing UTM Easting
									By							

WELL LOG (continued from front)	COMMENTS
---------------------------------	----------

[illegible]

EAST

NORTH

Locate with reference to highways, intersecting streets and county roads, and distinctive landmarks.

MAP/INSERT OR SKETCH SHOWING LOCATION



WELL ABANDONMENT SUMMARY

Project: Genuine Parts
Location: Indianapolis, Indiana
Client: KERAMIDA Environmental, Inc.
Driller: Bernie Judy and Andrew Carpenter
EEL Project No.: 1-06-292

Date	Well No.	Casing & Screen Diameter/Type	Screen Length (ft)	Screen Slot Size	Casing Length (ft)	Total Depth of Well (ft)	Total Grout Footage (ft)
8-21-06	SVE-1	2" I.D. Schedule 40 PVC	10	0.010	8.5	18.5	16.5
8-21-06	SVE-2	2" I.D. Schedule 40 PVC	10	0.010	10.4	20.4	18.4
8-21-06	SVE-3	2" I.D. Schedule 40 PVC	10	0.010	9.75	19.75	17.75
8-21-06	SVE-4	2" I.D. Schedule 40 PVC	10	0.010	9.7	19.7	17.7
8-21-06	SVE-5	2" I.D. Schedule 40 PVC	10	0.010	8.4	18.4	16.4
8-29-06	SVE-6	2" I.D. Schedule 40 PVC	10	0.020	5.0	15.0	13.0
8-29-06	SVE-7	2" I.D. Schedule 40 PVC	10	0.020	9.0	19.0	17.0
8-21-06	SVE-28S	2" I.D. Schedule 40 PVC	4.5	0.010	1.0	5.5	5.0
8-21-06	SVE-28D	2" I.D. Schedule 40 PVC	5	0.010	6.5	11.5	11.0
8-21-06	SVE-29S	2" I.D. Schedule 40 PVC	4	0.010	1.2	5.2	5.0
8-21-06	SVE-29D	2" I.D. Schedule 40 PVC	4	0.010	6.3	10.3	10.0
8-21-06	SVE-31S	2" I.D. Schedule 40 PVC	4	0.010	1.4	5.4	5.0
8-21-06	SVE-31D	2" I.D. Schedule 40 PVC	4	0.010	1.6	10.6	10.0
8-29-06	SVE-32S	2" I.D. Schedule 40 PVC	4	0.020	1.0	5.0	5.0
8-29-06	SVE-32D	2" I.D. Schedule 40 PVC	4	0.020	6.4	10.4	10.0
8-21-06	MMW-147A*	2" I.D. Schedule 40 PVC	10	0.010	17.95	27.95	25.95
9-1-06	MMW-148	2" I.D. Stainless steel	10	0.010	13.5	23.5	21.5
8-21-06	MMW-132*	2" I.D. Stainless steel	10	0.010	10.3	20.3	18.3

Depths are approximate.
* - Boring logs not available.





KERAMIDA Environmental, Inc.

LOG OF BORING SVE-1

(Page 1 of 1)

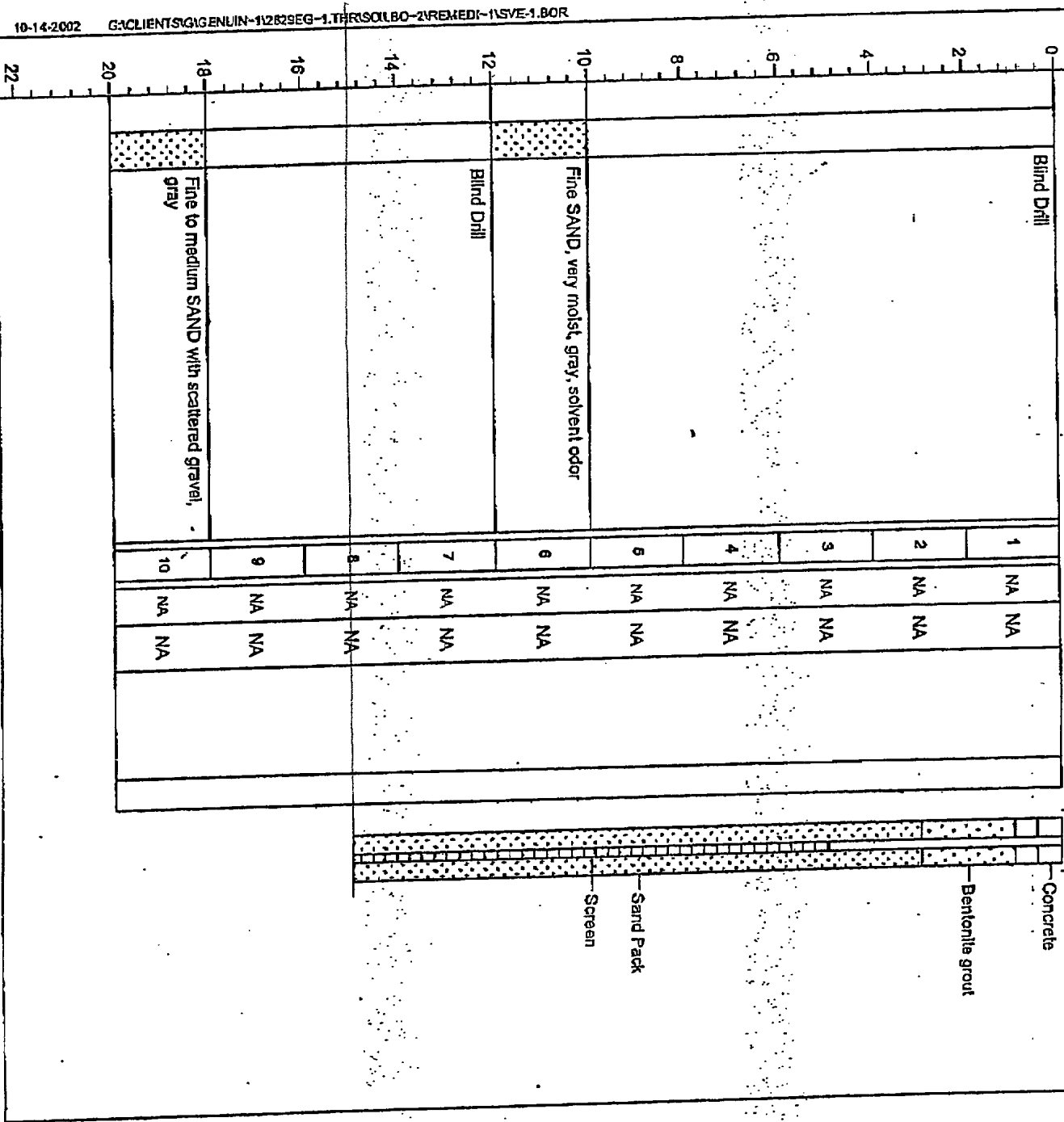
Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 5/3/00
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Northing : 1849248.24
Easting : 170414.68

Depth in feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
---------------------	------	---------	-------------	---------	----------	------------	---------	--------------

Well: SVE-1
Elev: 712.62



10-14-2002 G:\CLIENTS\GIGEN\IN-112829EG-1\THRSOL\BO-2\REMED-1\SVE-1.BOR



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-2

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA, Project No. 2829E

Project ID : 2829E
Date Drilled : 5/3/00
Dating Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Nothing : 164994.82
Easting : 170439.54

Depth in feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
---------------------	------	---------	-------------	---------	----------	------------	---------	--------------

Blind Drill

Well: SVE-2
Elev.: 712.76

Cover

Concrete

Bentonite grout

Sand Pack

Screen

10-11-2002 G:\CLIENTS\GIGENUIN-1\2829EG-1.THRSOILBO-2\REMED-1\SVE-2.BOR

22

20

18

16

14

12

10

8

6

4

2

0

1

NA

NA

2

NA

NA

3

NA

NA

4

NA

NA

5

NA

NA

6

NA

NA

7

NA

NA

KERAMIDA Environmental, Inc.

LOG OF BORING SVE-3

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

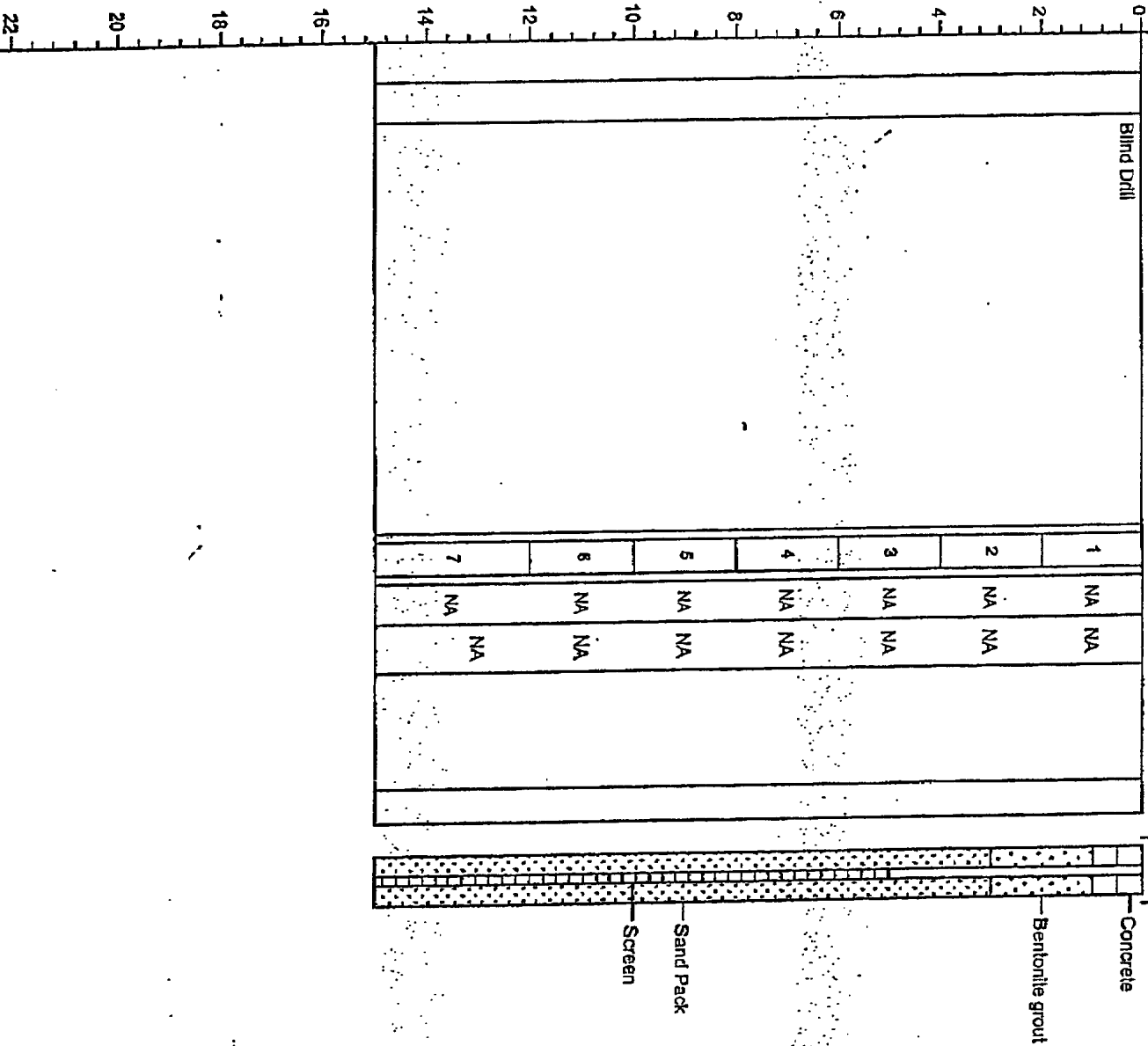
Project ID : 2829E
Date Drilled : 5/3/00
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Northings : 164911.24
Eastings : 170446.33

Depth in feet	USCS	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
	GRAPHIC						

Well: SVE-3
Elev.: 712.14

10-11-2002 G:\CLIENTS\GENUIN-1\2829EG-1.THRI\SOILBO-2\REMER-1\SVE-3.BOR



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-4

(Page 1 of 1)

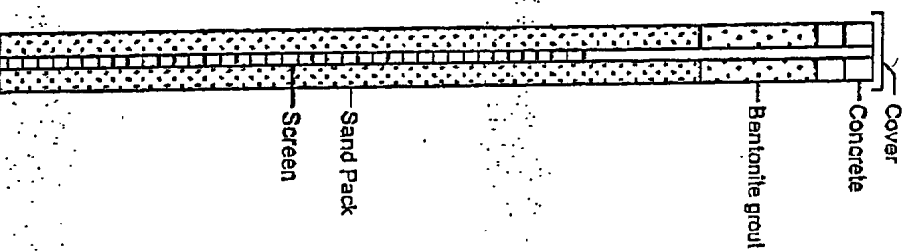
Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 5/2/00
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Northing : 1649908.69
Easting : 170410.38

Depth in feet	USCS	DESCRIPTION	Samples		REMARKS	Water Levels
	GRAPHIC		Rec %	PID ppm		
0		Blind Drill	1	NA	NA	
2			2	NA	NA	
4			3	NA	NA	
6			4	NA	NA	
8			5	NA	NA	
10			6	NA	NA	
12			7	NA	NA	
14						
16						
18						
20						
22						

Well: SVE-4
Elev.: 712.31



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-5

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 5/2/00
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Northing : 1649881.60
Easting : 170396.08

Depth in feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
0			Blind Drill	1	NA	NA		
2				2	NA	NA		
4				3	NA	NA		
6				4	NA	NA		
8				5	NA	NA		
10				6	NA	NA		
12				7	NA	NA		
14								
16								
18								
20								
22								

Well: SVE-5
Elev.: 711.86

Cover
Concrete
Bentonite grout
Sand Pack
Screen

KERAMIDA Environmental, Inc.

LOG OF BORING SVE-6

(Page 1 of 1)

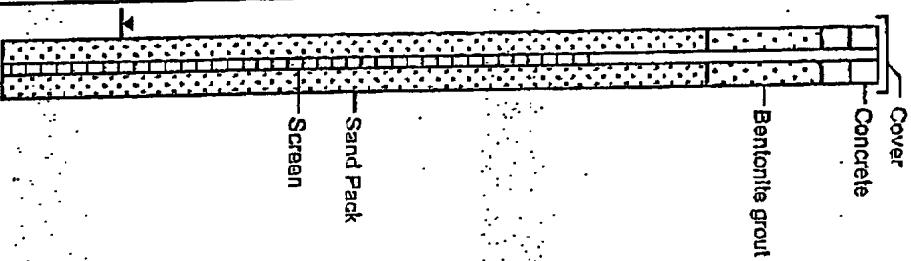
Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 5/2/00
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Northing : 1649883.33
Easting : 170423.61

Well: SVE-6
Elev.: 712.25

Depth in feet	USCS	DESCRIPTION	Samples		REMARKS	Water Levels
	GRAPHIC		Rec %	PID ppm		
0		Silly CLAY, gray	1	NA	NA	
2			2	NA	NA	
4			3	NA	NA	
6			4	NA	NA	
8			5	NA	NA	
10			6	NA	NA	
12		Sandy Silty CLAY, gray	7	NA	NA	
14		Fine SAND, wet	8	NA	NA	
16			9	NA	NA	
18		Same as above, scattered gravel	10	NA	NA	
20						
22						



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-7

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

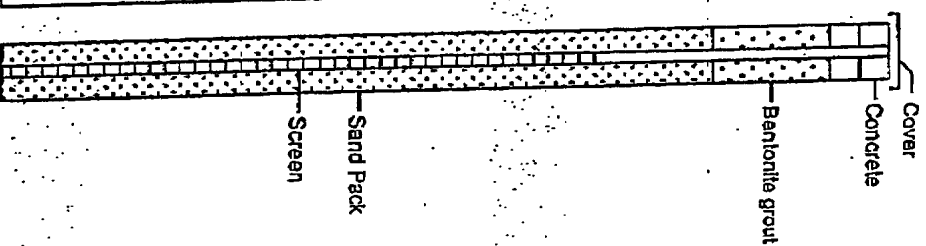
Project ID : 2829E
Date Drilled : 5/3/00
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Northing : 184988.48
Easting : 170457.31

Depth In feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
---------------------	------	---------	-------------	---------	----------	------------	---------	--------------

Well: SVE-7
Elev.: 711.80

0	Blind Drill			1	NA	NA		
2				2	NA	NA		
4				3	NA	NA		
6				4	NA	NA		
8				5	NA	NA		
10	Fine SAND, gray			6	NA	NA		
12				7	NA	NA		
14	Blind Drill							
16								
18								
20								
22								





KERAMIDA Environmental, Inc.

LOG OF BORING, SVE-28S

(Page 1 of 1)

Genuine Parts Company
700 North Clin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2828E

Project ID : 2828E
Date Drilled : 8/25/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Depth
in
feet

USCS

GRAPHIC

DESCRIPTION

Samples

Rec
%PID
ppm

REMARKS

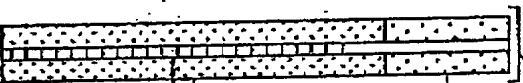
Water Levels

Well: SVE-28S
Elev.:

Cover

Bentonite grout

Sand Pack
Screen



Blind Drill

1
NA2
NA3
NA

KERAMIDA Environmental, Inc.

LOG OF BORING SVE-28D

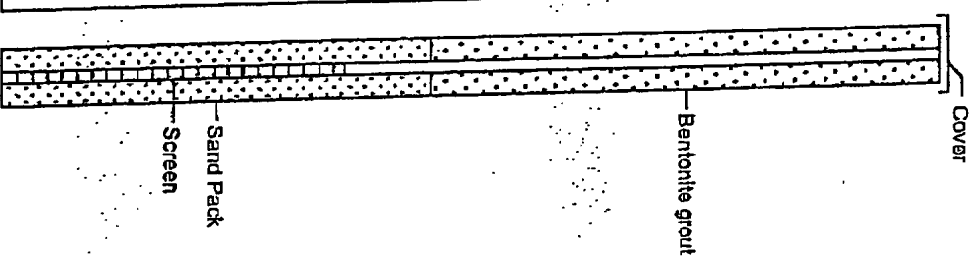
(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/25/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Depth in feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
0			Blind Drill	1		NA		
				2		NA		
				3		NA		
				4		NA		
				5		NA		
				6				
12								
10								
9								
8								
7								
6								
5								
4								
3								
2								
1								
15								

Well: SVE-28D
Elev.:



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-29S

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Bore Drilled : 9/4/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Etc.

Depth in feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels
				1	2	3		
0			Blind Drill	1		NA		
1				2		NA		
2				3		NA		
3								
4								
5								
10								
15								

Well: SVE-29S
Elev.: _____

Cover
Bentonite grout
Sand Pack
Screen

KERAMIDA Environmental, Inc.

LOG OF BORING SVE-29D

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 9/4/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Rec %
PID ppm
REMARKS
Water Levels

Well: SVE-29D
Elev.:

Depth
In
feet

USCS

GRAPHIC

DESCRIPTION

Samples

Rec %
PID ppm

REMARKS

Water Levels

Cover

Blind Drill

1

NA

2

NA

3

NA

4

NA

5

NA

6

Bentonite grout

Sand Pack

Screen

11-02-2003 G:\CLIENTS\G\GENUIN-1\2829EG-1_THRISOILBO-2\NEWSVE-1\SVE-29D.BOR

KERAMIDA Environmental, Inc.

LOG OF BORING SVE-31S

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/25/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Depth
in
feet

USCS

GRAPHIC

DESCRIPTION

Samples

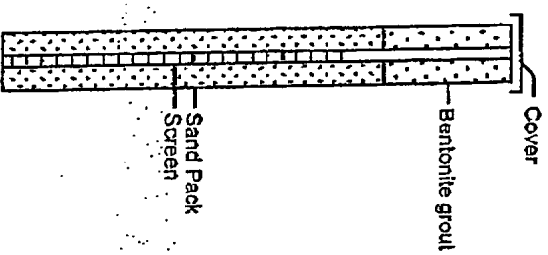
Rac
% PID
ppm

REMARKS

Water Levels

Well: SVE-31S
Elev.:

0		Blind Drill	1	NA	
1			2	NA	
2			3	NA	
3					
4					
5					
10					
15					



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-31D

(Page 1 of 1)

Genuine Parts Company
700 North Olin Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 8/25/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex

Depth in feet	USCS	GRAPHIC	DESCRIPTION	Samples	Rec %	PID ppm	REMARKS	Water Levels	Well: SVE-31D Elev.:
0			Blind Drill	1		NA			
				2		NA			
				3		NA			
				4		NA			
				5		NA			
				6					
10									
5									
0									

Cover

Bentonite grout

Sand Pack

Screen



KERAMIDA Environmental, Inc.

LOG OF BORING SVE-32S

(Page 1 of 1)

Genuine Parts Company
700 North Clift Avenue
Indianapolis, Indiana
KERAMIDA Project No. 2829E

Project ID : 2829E
Date Drilled : 6/26/03
Drilling Method : HSA
Geologist/Tech : S. Cobb
Drilling Co. : Earth Ex.

Samples :
Rec % :
PID ppm :
REMARKS :
Water Levels :

Depth
in
feet

USCS

GRAPHIC

DESCRIPTION

Samples

Rec

PID

REMARKS

Water Levels

Well: SVE-32S
Elev.:

Cover

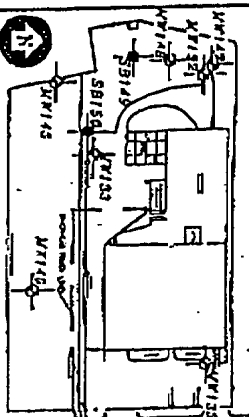
Bentonite grout

Sand Pack
Screen

0	Blind Drill	1	NA	
		2	NA	
		3	NA	
5				
10				
15				

151M13

LOCATION MAP



ENGINEERING-SCIENCE, INC. WELL LOG

Page 1 of 1

WELL NUMBER	SB148/NV148	LOCATION	GR-AGT, PLANT 10
DATE	6-3-93	WEATHER	CLOUDY, 65 ° F
LOGGED BY	D. GROUTAGE	DRILED BY	
DRILLING METHOD	4.25" ID HOLLOW-STEM AUGER	SAMPLING METHOD	EARTH EXPLORATION, INC. SPLIT-SPUD
GRAVEL PACK	SILICA SAND	SEAL	BENTONITE CHIPS

CASING TYPE SCH 5, 316 S.S.

DIAMETER 2" LENGTH 15' HOLE DIA. 8"

SCREEN TYPE SCH 5, 316 S.S.

SLOT 0.010" DIAMETER 2" LENGTH 10' TOTAL DEPTH 25.5'

SAMPLE NO.	ORGANIC VAPORS (PPM)	DEPTH	SAMPLE RECOVERY	PENETRATION RESISTANCE	LITHOLOGY/REMARKS (COLOR, SOIL, TYPE, SORTING, MOISTURE, PLASTICITY)	LITHO. PROFILE	WELL COMPLETION
0.0		0-1			0-1.5' SANDY SILT; topsoil brown to dark brown moist.		
		1-2			1.5'-8.3' SANDY CLAY; brown to orange brown with some silt; moderately plastic, moist.		
		2-3	80%	3			
		3-4		2			
		4-5		4			
		5-6					
		6-7					
		7-8					
		8-9		2	8.3'-11' SANDY SILT with clay; becoming more sandy with depth. Gray, wet. Becoming saturated at approx. 9.5'.		
		9-10	100%	2			
		10-11		4			
		11-12		3			
		12-13			11'-24.2' SAND. Poorly sorted with gravel, some sand, fine to medium grained laminae 2-3" thick at various intervals; gray.		
		13-14		8			
		14-15	50%	12			
		15-16		13			
		16-17		14			
		17-18					
		18-19		7			
		19-20	60%	11			
		20-21		24			
		21-22		21			
		22-23					
		23-24		8			
		24-25	80%	14			
		25-		17	24.2'-25.5' SILT with small gravel; gray, damp to dry; hard. TD = 25.5'		

WELL CONSTRUCTION:

SCREENED:
SAND PACK: 25.5'-10.5'
BENTONITE CHIPS: 13'-10.5'
BENTONITE SLURRY: 10.5'-2'
BENTONITE CHIPS: 2'-1'
Finished with flush mount
protective well box in CONCRETE.

SOIL	CHSI	DATE	6-14-93	DRILLER	CK
UPDATE #	0	CONCRETE		SAND	
		SANDY SILT		SANDY CLAY	
				BENTONITE CHIPS	
				SILT	
				BENTONITE SLURRY	